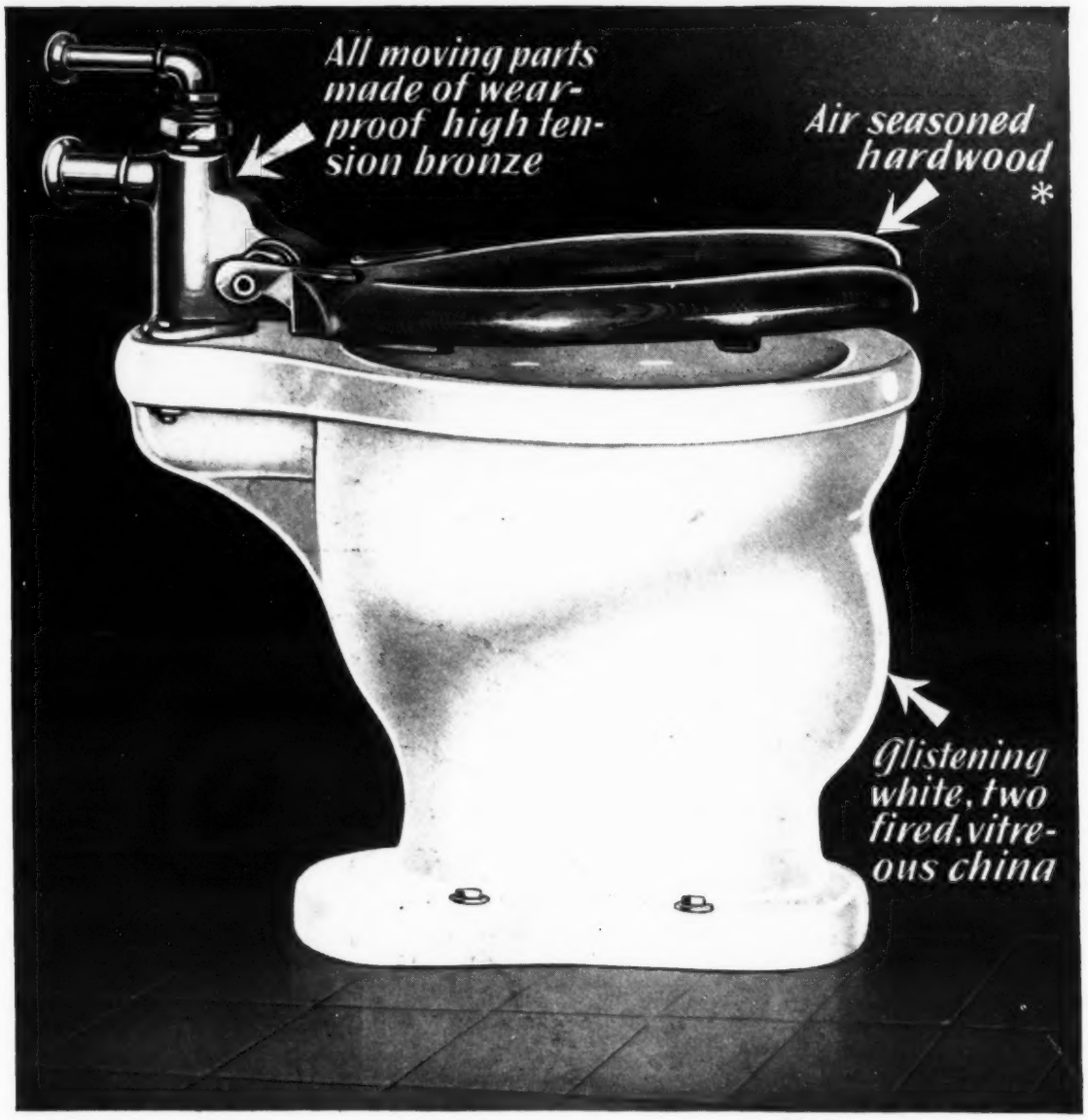
The School Review

MARCH 1931

891 · ANNIVERSARY NUMBER · 193

THE BRUCE PUBLISHING COMPANY



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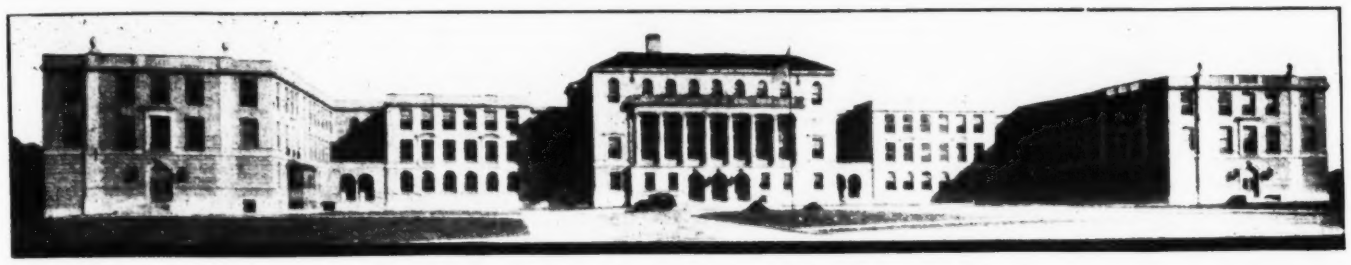

Western Hills High School, Cincinnati Garber and Woodward, Architects

Economy and Accuracy In The Heating and Ventilating Of This School Building

Western Hills High School Building, Cincinnati, Ohio is equipped with a split system of heating and ventilating; the various rooms and departments being heated by direct radiation and the ventilation being supplied by means of fans and ducts both for the introduction of fresh air and exhaustion of vitiated or foul air. The entire system of heating and ventilating is controlled by the Johnson System. 100 individual Johnson room thermostats operate 190 Sylphon radiator valves, automatically maintaining a uniform, normal temperature in each room throughout the day. The coils and fresh-air dampers in connection with the fans are equipped with Johnson thermostats, controlling the ventilation of the building at the proper temperature. Accuracy in producing positively correct schoolroom condition is automatically established . . . . and at the same time a valuable fuel economy is obtained in the prevention of excessive fuel consumption and waste which ordinarily occurs. The Johnson System Of Heat And Humidity Control applies to every form, plan and system of heating and ventilating . . . . and is installed to meet any individual requirement.

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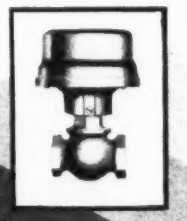

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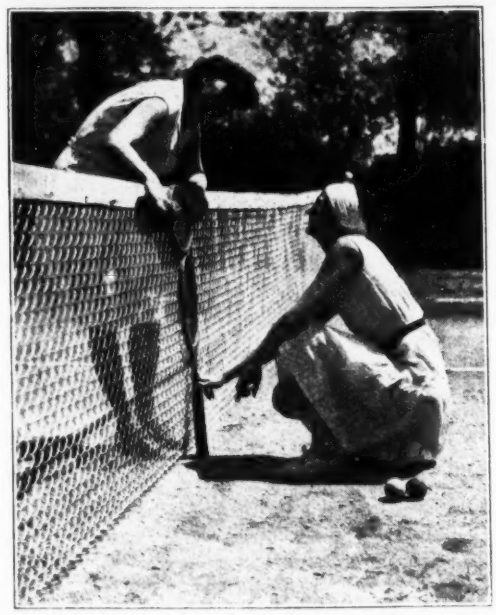

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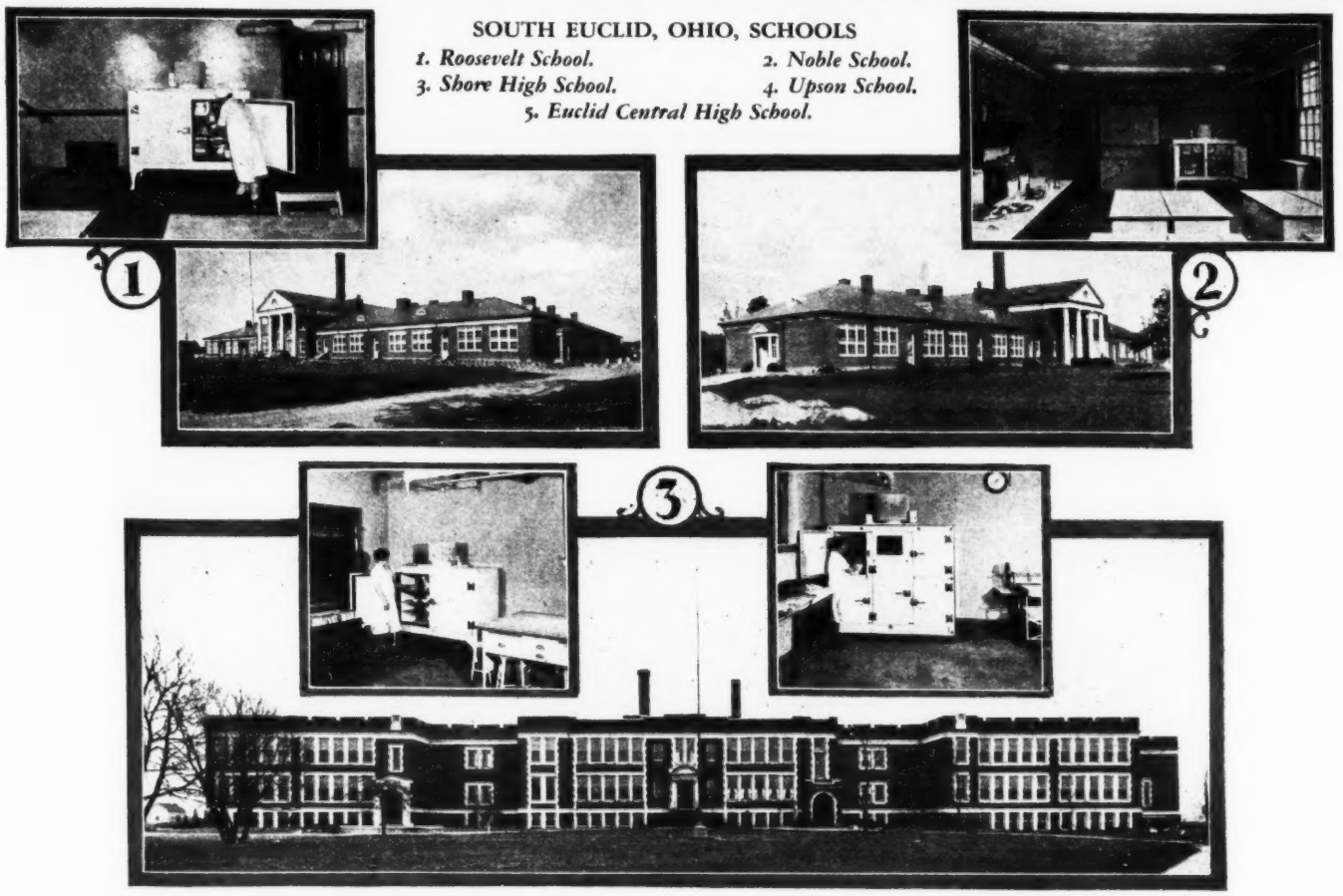

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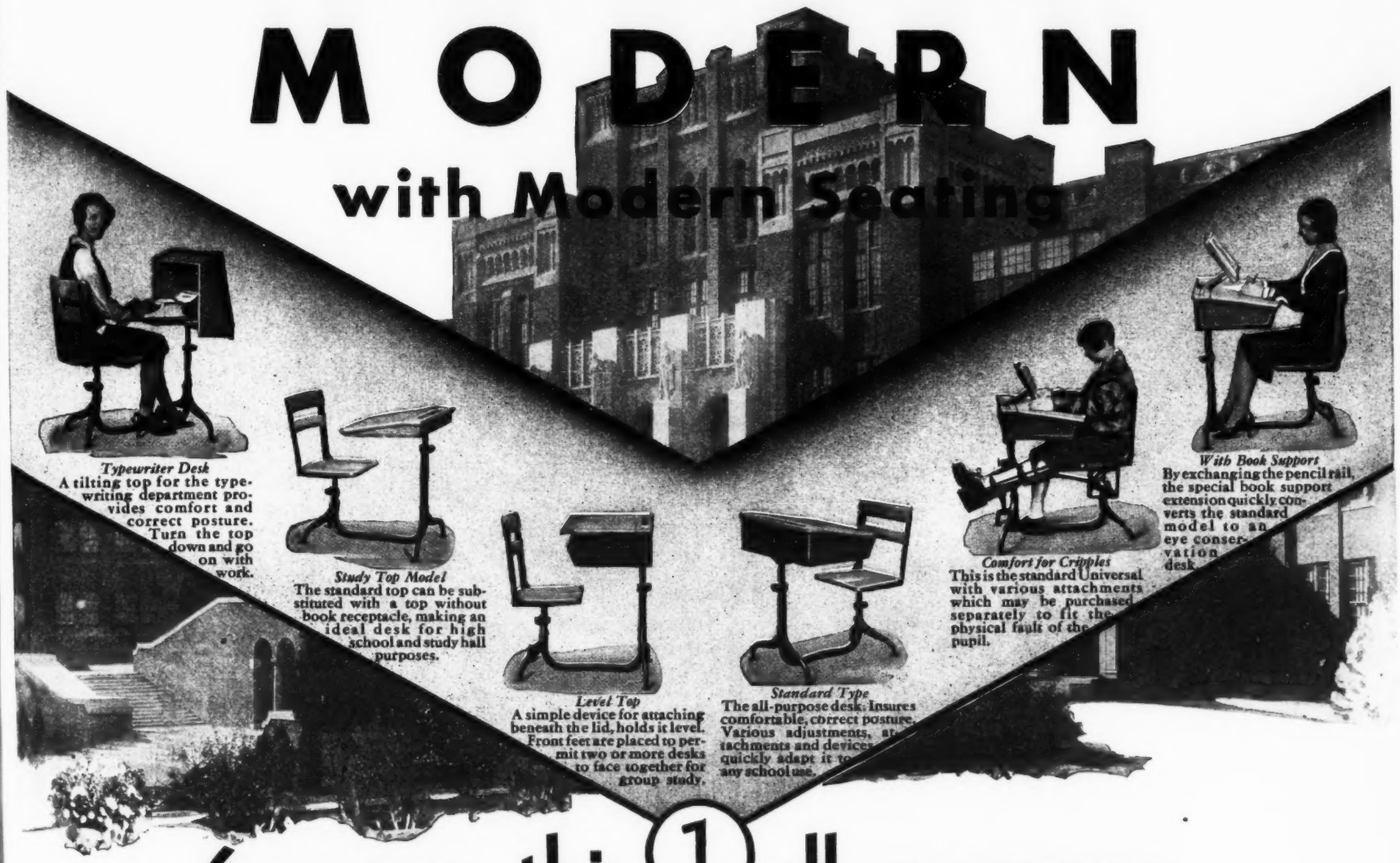

Typewriter Desk
A tilting top for the typewriting department provides comfort and correct posture. Turn the top down and go on with work.

Study Top Model
The standard top can be substituted with a top without book receptacle, making an ideal desk for high school and study hall purposes.

Level Top
A simple device for attaching beneath the lid, holds it level. Front feet are placed to permit two or more desks to face together for group study.

Standard Type
The all-purpose desk. Insures comfortable, correct posture. Various adjustments, attachments and devices quickly adapt it to any school use.

Comfort for Cripples
This is the standard Universal with various attachments which may be purchased separately to fit the physical fault of the pupil.

With Book Support
By exchanging the pencil rail, the special book support extension quickly converts the standard model to an eye conservation desk.

6 ways this ① all-purpose desk can serve in every school

YOUR school is as modern as its equipment. For, after all, pupil-efficiency is proportionate to the efficiency of the desks at which they work.

Today . . . superintendents, principals, and other educational executives know that proper seating is a definite factor in the physical development . . . and therefore in the mental development . . . of every pupil.

American Seating Company school seats are the product of scientific research . . . years of specialized experience . . . in the needs of today's classroom. Our latest product . . . the American All-Purpose Universal Desk, is an outstanding example of our contribution to a finer, brighter future for America's school children. With posture-correctness, it incorporates features that are new, distinctive . . . yet immediately recognizable as *superior* in seating for progressive, modern schools.

Free poster on posture

To help remind pupils to always sit erect —to focus their attention on the benefits of correct sitting posture . . . we have prepared an attractive 3 color poster (see illustration) suitable for hanging in the classroom. It measures 17½ inches by 25 inches—so it can be read easily from the back of the room. 60,000 have already been sent to schools the country over . . . are hanging in classrooms, daily reminding pupils to sit erect. Teachers and educators who send in the coupon will be furnished with a poster for each classroom, *free*. Upon request, several authoritative booklets on posture and seating will also be included. Please use the coupon.

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Note how 6 features make the "American" Universal the outstanding all-purpose desk of all time.

1 *Book Support*—A special book support extension—quickly converting the standard model to an eye conservation desk.

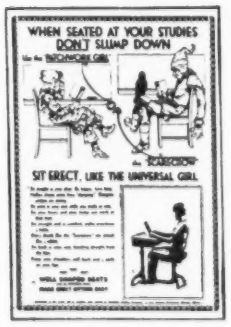
2 *Level Top*—A simple device attached below the lid holds it at a level. Especially desirable for group study or socialized recitation.

3 *Typewriter Desk*—A tilting top for use in the typewriting department. Turn the top down—and it's set for study or work.

4 *Comfort for Cripples*—Various attachments purchased separately as required, to fit the physical fault of the pupil.

5 *Study Hall Top*—In place of the standard top, a top without book receptacle can be substituted. Ideal for high school and study hall purposes.

6 *Standard Type*—For all 'round school use. As indicated in illustrations, various adjustments, attachments and devices quickly adapt it to any use.



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Name.....

Address.....

Position..... ☐ Number of classrooms
(Indicate here whether you are Superintendent, Principal or Teacher)

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Madison, Wisconsin
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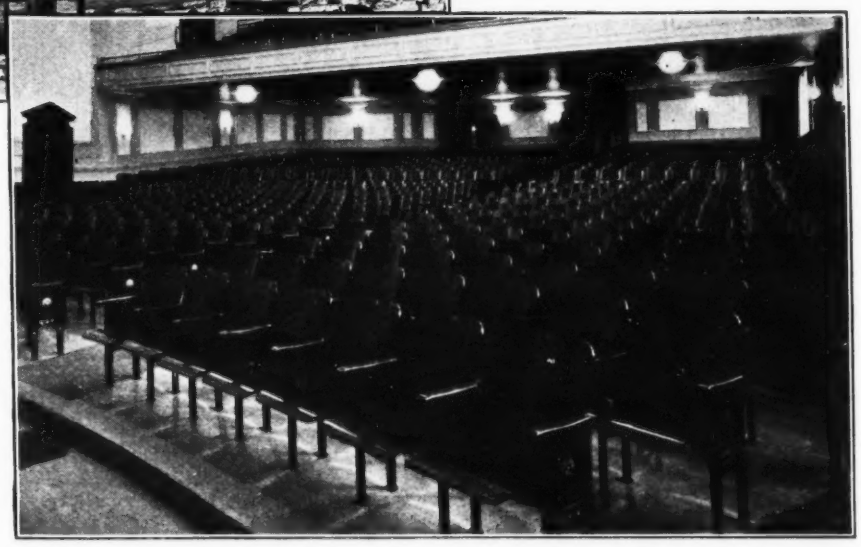

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WEST HIGH SCHOOL
MADISON, WISCONSIN
IS

KUNDTZ EQUIPPED

KUNDTZ ENGINEERS have studied and perfected equipment that keeps the child at ease, fosters concentration, helps maintain correct posture. The new West High School, of Madison, Wisconsin, is one of many with a complete auditorium installation by The Theodor Kundtz Company. Pupils and adults alike appreciate these restful chairs during long auditorium sessions.

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Our Single Pedestal, Stationary Model No. 851 is perhaps the most practical of school desks for both junior and senior schools. No detail has been overlooked in making this desk capable of resisting hard wear. The large diameter of the base, and also of the desk and chair supports, provides a most rigid foundation and permanent installation because of a minimum amount of strain on floor, box, and chair fastenings. This desk is furnished with either lifting lid or open box.

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Flexible seating arrangements for group instruction are easily obtained with our Model No. 640. This movable, adjustable desk embodies the many advanced and exclusive Kundtz features which assist in giving years of satisfactory service. The correct posture chair is supported by a solid hexagonal shaft mounted on a special mechanical revolving device which permits the chair to be turned at an angle of 72 degrees. A simple adjustment enables this desk to care for students of varying sizes.

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Kundtz engineers, together with leading authorities in various fields of education, have anticipated changes in the methods of teaching, and have prepared the proper seating to effectively meet the requirements of the student. We will be glad to send you our catalog which describes Kundtz Eclipse classroom, homeroom, study hall and auditorium equipment in full detail. No obligation.

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Kindly send me full-line catalog on your modern improved classroom and auditorium equipment.

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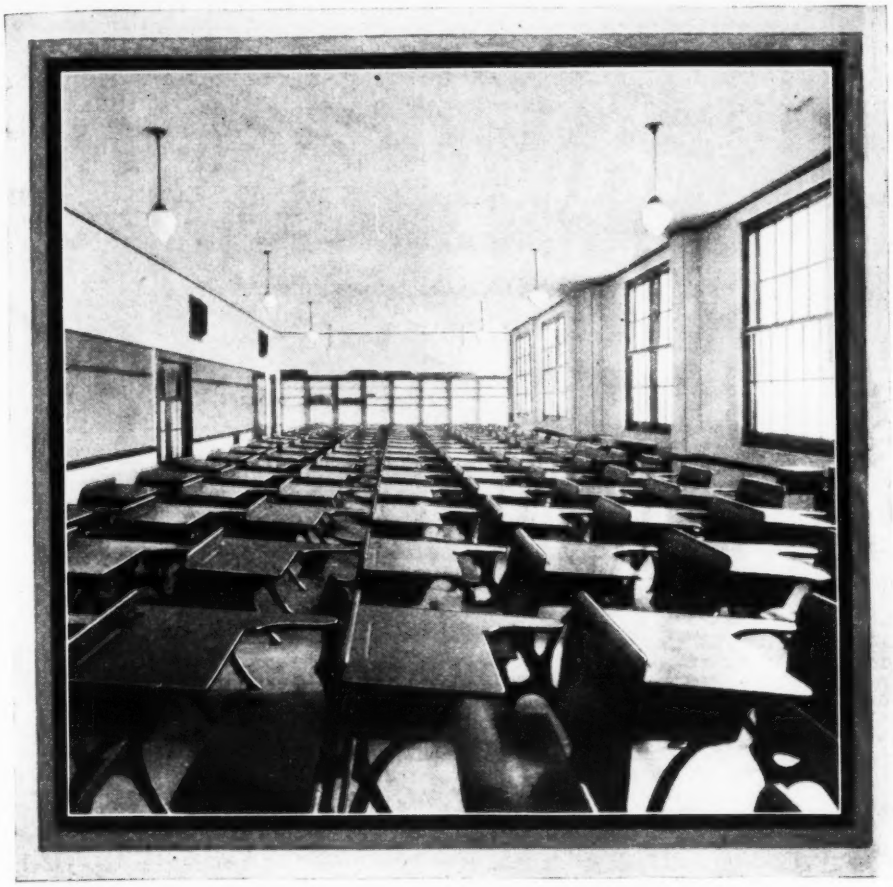

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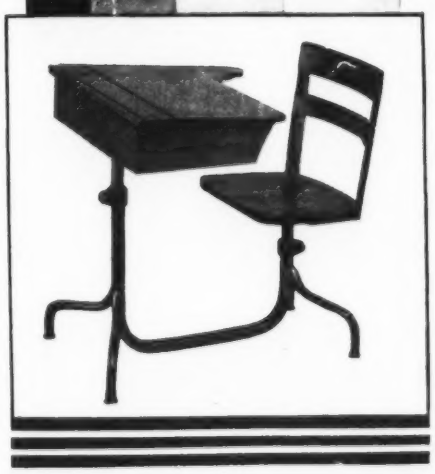

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SKILSAW SANDER is a new belt type machine, weighs only 18 lbs., is *perfectly balanced*, convenient to handle and easy to use. No experience is required to obtain a perfect job—"RIPPLES" are impossible. Belts are instantly adjusted and removed, accurately centered at all times and can be furnished in all grits, including belts of non-filling abrasive for removing varnish.

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VOL. 82
No. 3

THE AMERICAN School Board Journal

MARCH,
1931

A Periodical of School Administration

Eastern Office:
342 MADISON AVENUE
NEW YORK, N. Y.

Published on the first day of the month by
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524-544 No. Milwaukee Street, Milwaukee, Wis.

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It also has taught the trade to recognize the school market as one which is well worth, in point of scope and volume, the attention of authors, inventors, scientists, and mechanics. The service of these is eloquently exemplified in the modern American school plant and must be regarded as a real factor in the educational progress of the nation.

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Editorial Material—Manuscripts and photographs bearing on school administration, superintendence, school architecture, and related topics are solicited, and will be paid for upon publication. Contributions should be mailed to Milwaukee direct, and should be accompanied by stamps for return, if unavailable. Open letters to the editor must in all cases contain the name and address of the writer, not necessarily for publication, but as evidence of good faith.

The contents of this issue are listed in the ***Education Index***.

THE AMERICAN
School Board Journal

Founded March, 1891, by WILLIAM GEORGE BRUCE

Volume 82, No. 3 MARCH, 1931 Subscription, $3.00 the Year

Forty Years of City School Administration

W. S. Deffenbaugh, Chief, Division of American School Systems, U. S. Office of Education

Before the year 1890 very little had been written on the subject of school administration. In the report of the U. S. Commissioner of Education for 1892–93, the subject does not appear among a classified list of 41 different topics upon which papers had been read before the National Education Association from 1870 to 1893, inclusive. A few reports and papers that might have been included under "administration" had, however, been presented, but they are listed under other headings. Among these were: The Report of the National Council of Education in 1888 on *The Business Side of City School Systems; City School Systems,* by W. H. Maxwell, in 1890; and *Who Shall Appoint Teachers and on Whose Nomination,* by H. S. Tarbell, published in 1893.

The chief source of information regarding school administration during the 90's were the reports of the U. S. Commissioner of Education, THE AMERICAN SCHOOL BOARD JOURNAL, the reports of the National Education Association, and the reports of state and city school superintendents. Prior to 1900 there were no textbooks treating of school administration except in a very general way. Payne's *School Supervision,* which appeared in 1875, made some little reference to the superintendent's powers and duties. *Pickard's School Supervision,* published in 1890, contains brief chapters on the superintendent's relation to the board of education, to teachers, pupils, and parents. In 1904 Chancellor's *Our Schools: Their Administration and Supervision* was published; and in 1908 he supplemented it with *Our Schools: Their Direction and Management.* In 1906 Prince's *School Administration, Including the Organization and Supervision of Schools* appeared. Another book published about that time was Dutton and Snedden's *Administration of Public Education in the United States,* which treated of state, county, and city school administrative problems. Following these early publications on administration came Cubberley's *State and County Educational Reorganization in 1914,* and his *Public School Administration in 1916,* which was largely concerned with city school-administrative problems.

School Administration Literature

There being a scarcity of literature on the subject of school administration and also a lack of interest in it during the 90's, the professors of education, or pedagogy, in the few colleges and universities that had organized departments of education offered very little in the field of administration, and what little they did offer related almost entirely to matters of school management. For example, the early catalogs of Teachers College, Columbia University, which was no doubt offering more courses in education than was any other college or university at that time, list few courses relating to school administration. There was a course in school management, a course on supervision and school law in which special studies were made of the duties of a school superintendent, the business of the superintendent's department relating to the school board, appropriations and expenditures, school buildings, etc. There was also a weekly one-hour seminar on the administration of public education in the United States.

NOTE. The notable progress made in the field of city school administration is comprehensively described by Dr. Deffenbaugh, who must be regarded as a leading authority on the subject. In the article herewith presented an illuminating picture is drawn of the evils and shortcomings that existed in a former day, the changes that were from time to time effected, and the new conceptions that have come into recognition with a modern day.—The Editor.

At the present time it is almost an endless task to list all the textbooks, magazine articles, masters' and doctors' theses, and undergraduate and graduate college courses on the various problems relating to city school administration.

With the growth of interest in administrative problems, many changes have been effected in the administration of the city schools of the country, but only a few of these can be enumerated in this brief article.

Large Boards of Education

The boards of education in many cities were very large in 1890. According to the Report of the Commissioner of Education for the year 1895–96, which contains data regarding the size of boards of education in 20 of the larger cities, 16 of them had boards of education of more than 9 members. Detroit, Mich., for example, had a board of education consisting of 16 school inspectors, one elected from each ward in the city; Cincinnati, Ohio, as another example, had a board of 30 members, one elected from each ward; and New York City had a board of education of 21 members appointed at large by the mayor and 35 boards of school inspectors of 5 members each, appointed by the mayor from the inspection districts defined by the board of education. The number of members of the general board of education of New York City was later increased to 46, and some years afterward it was decreased to its present size of 7 members. New Orleans, La., had a board of school directors consisting of 20 members, 8 of whom were appointed by the governor of the state, with the approval of the state board of education, and 12 were elected by the city council. Milwaukee, Wis., had a board of 36 members appointed by the aldermen of the several wards, subject to the confirmation of the council.

Pittsburgh and Philadelphia, Pa., were the outstanding examples of cities having large boards. The Philadelphia board consisted of 37 members appointed by the judges of the court of common pleas by wards. There were 37 boards of directors of sections or wards, with 13 members on each of these boards. Twelve were elected by the people, and the member of the general board for the ward as ex-officio member of the sectional or ward board. In Pittsburgh there was a central board of 37 members elected by wards by the several boards of directors of subdistricts or wards. There were 37 subdistrict boards consisting of 6 members each elected by the voters of the ward. In Philadelphia the district boards had power to erect and establish as many schools as might be determined upon by the board of education, to appoint principals and teachers, to provide all things necessary for conducting the schools, and to superintend and direct said schools.

City of Subschool Boards

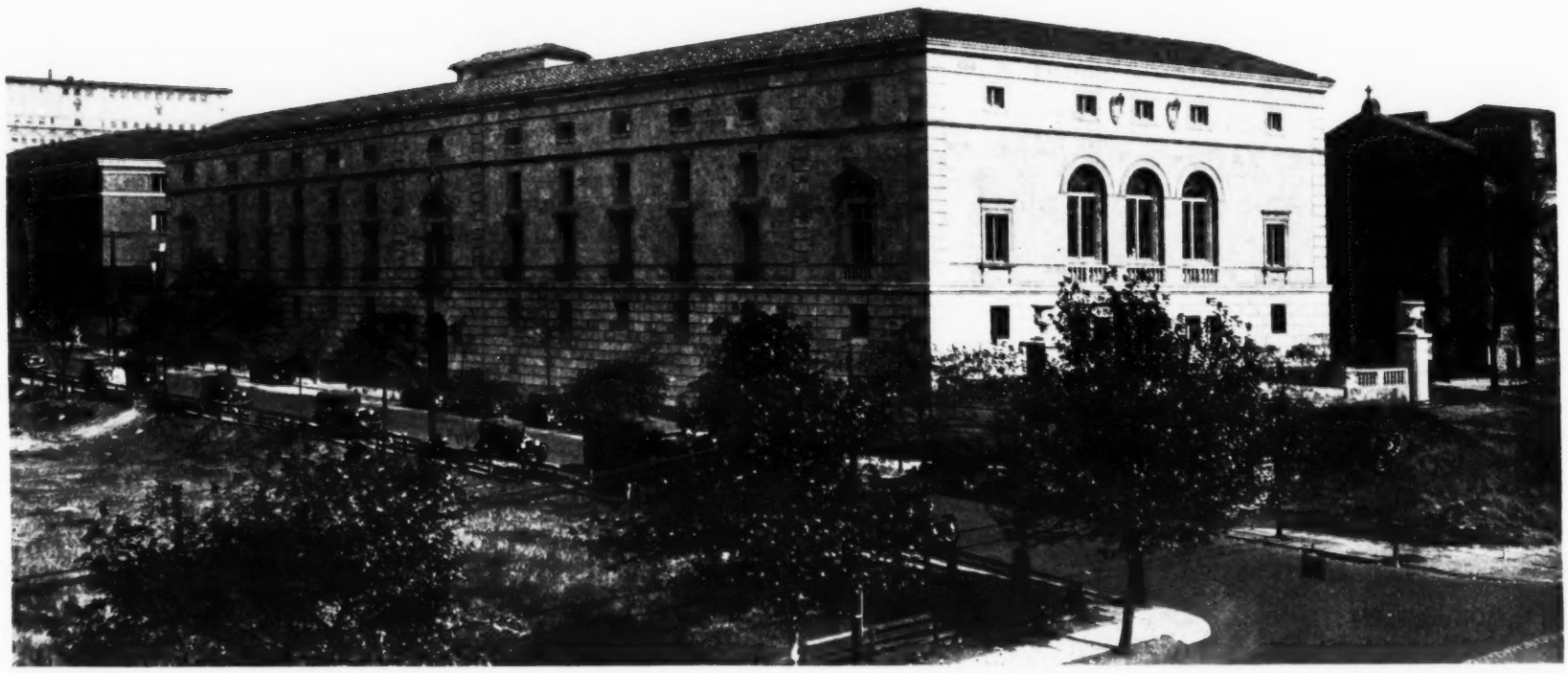
In Pittsburgh, each of the wards of the city constituted a subschool district, but a subschool district could be subdivided, or two of them could be consolidated by the central board of education upon petition of the proper boards of directors, provided the city councils by an ordinance declared the subdistrict to be a separate election district. Among the powers of these subdistrict boards was that of erecting school buildings and of levying taxes for this purpose.

Among the few larger cities that had small boards of education may be mentioned Cleveland, Ohio, which had a school council of 7 members elected by the people. There was also a school director elected from the city at large, who was the executive officer of the schools. Legislative power was vested in the school council. Legislation was by resolution, and each resolution was submitted to the school director for approval. In Buffalo there was no board of education, the department of public instruction being one of the 10 city departments and the city superintendent of schools, who was elected by the people, was head of the department. Minneapolis had a board of 7 members, elected at large, St. Paul a board of 7 appointed by the mayor. In Denver, Colo., there were 3 separate school organizations within the city limits, known as districts Nos. 1, 2, and 17, Arapahoe county.

Even in many of the smaller cities there were large boards of education, especially in those cities in which the members were elected by wards.

Today few city boards of education consist of more than 9 members. Appointment or election by wards has practically disappeared. In the 90's the school-board members in 9 of 20 of the large cities were elected or appointed by wards. Now all the boards of education in these same cities are elected or appointed at large.

In cities in which school-board members were elected by wards, these ward representatives



City school administration has reached a new dignity and a place of recognized importance in small as well as large communities. The new School Administration building in the city of Pittsburgh, opened in 1928, is a magnificent illustration of the dignity and recognized importance of the school administration.

considered themselves responsible to their constituents. In the election of teachers ward members often nominated teachers for their respective ward schools.

School Boards and Ward Politics

An idea of school conditions in some of the cities that had the ward system may be obtained from the following which appeared in the 1895–96 Report of the U. S. Commissioner of Education:

"Ward politics is a matter constantly before the mind of school lawmakers, and any amount of inventive genius has been exercised to devise a way of choosing school boards that would make it impossible for the ward boss to interfere. Incompetent principals and teachers chosen to 'encourage' political henchmen; contracts corruptly given to fatten the treasuries of partisan organizations; assessments of teachers for campaign funds; unseemly intrigues, strifes, and bickering within the schools themselves by adherents of different parties; the sons of some local heeler allowed to be habitually unruly, to the detriment of general discipline, because the teacher fears for his position if he attempts to assert his authority — all these evils and more are feared by those who have seen the results when local politics has had undue influence."

The question whether board members should be ward representatives is no longer asked. A question that does occasionally arise is whether they should be elected by popular vote or appointed by the mayor, but usually only in those cities where the boards are appointed. Since 1890 only a few cities have changed their method of selecting the members of their boards of education except with respect to ward representation. A question that is also asked is: Should city boards of education be fiscally independent of the municipal officials? Possibly there has been more discussion over this matter than over any other relating to the administration of city school systems. The tendency has, however, been toward fiscal independence. In 1902, according to data compiled by Rollins[1] the boards of education in 17 of 28 cities having a population of 200,000 and over were fiscally dependent upon the mayor or council or both. Today the boards of education in only 8 of these same cities are dependent upon these officials.

[1] *School Administration in Municipal Government.* The Macmillan Co.

Recent legislation in Texas requires any city with less than 100,000 population, upon petition signed by 25 per cent of its electors, to hold an election to determine whether the public schools shall be fiscally independent of the municipal authorities.

The idea has been growing that the responsibility for financing the schools should be placed squarely upon the shoulders of the board of education so that there may be no shifting of responsibility to a body that from the nature of its regular official duties has no such intimate knowledge of the needs of the schools as has the board of education.

Reducing Standing Committees

The tendency to reduce the number of standing committees of boards of education is generally considered another forward movement toward the simplification of the administrative machinery of the school systems of the country. When boards of education were large and when their functions were not so clearly understood as they now are, the boards were organized on the committee plan, the committees being in reality smaller boards within the large boards. Even after boards of education were reduced in size the standing-committee system persisted in many cities.

By 1915 only 18 per cent of the boards of education in cities under 30,000 population had no standing committees; in 1922, 28 per cent had no such committees. In 1917 only 9 per cent of the boards of education in cities between 30,000 and 100,000 population were organized without committees. In 1927, 25 per cent had no such committees. In cities having a population of 100,000 and over the per cent of boards of education organized without standing committees in 1917 was 7; in 1927 the per cent was 38. The boards of education that still retain the committee system have fewer committees than they had some years ago.

The superintendent of schools is now generally regarded as the chief executive officer of the board of education, but some cities have a dual system — a superintendent in charge of professional matters and a business manager in charge of business affairs, each being directly responsible to the board of education.

At one time the opinion prevailed even among school superintendents that there should be two independent departments. In 1895 a subcommittee on the organization of city school systems recommended to the Department of Superintendence of the National Education Association that "the superintendent of instruction should be charged with no duty save the supervision of the instruction, but should be charged with the responsibility of making that professional and scientific, and should be given the position and authority to accomplish that end." The committee also expressed the following opinion: "The circumstances of the case naturally and quickly separate the duties of administration into two great departments: one which manages the business affairs, and the other which supervises the instruction. The business affairs of the school system may be transacted by any citizens of common honesty, correct purposes, and of good business experience and sagacity."

Would any committee of the National Education Association have made such a report at the 1931 meeting of the Department of Superintendence; if so, what would have been its reception?

Superintendent as Chief Executive

The city school superintendent, now regarded as the chief executive officer of the board of education, is consulted more regarding technical matters than he was 30 or 40 years ago when many superintendents took no official part in the selection of teachers. According to Rollin's study of *School Administration in Municipal Government,* published in 1902, in 27, or in 35.5 per cent, of 76 cities listed, the board of education or a committee of the board nominated teachers. If the smaller cities had been included in Rollin's study the per cent of boards of edu-

(Concluded on Page 116)

Growth and Function of State Education Departments

George M. Wiley, Assistant Commissioner of Education, State Education Department, Albany, New York

The rise of social democracy has compelled the state to take a vital interest in the training of an intelligent citizenship. The great changes which have taken place in our social, industrial, and economic life during the past forty years have, in part at least, been responsible for the growth and development of state departments of education during this period. The office of state superintendent of schools or state commissioner of education had been established in every state except one previous to 1890. However, the larger responsibilities of the state commissioner of education in relation to the development of state programs of education, his increasing functions for the purpose of insuring a minimum educational offering for every child, the rapid increase of state funds allocated for the equalization of educational opportunity — these and other factors are resulting in the growth of strong executive and administrative departments with thoroughly trained professional personnel.

The character of the professional staff of the state department and its functional relationship to the schools and to the citizenship of the state will vary widely. Since 1890 the trend has been definitely in the direction of enlarged state departments of education not only for the purpose of carrying out statutory requirements, but also to provide professional leadership in the development of an increasingly complex educational program. These duties and responsibilities, at least in the larger and more progressive states, have grown far beyond the powers of any individual or a single official. The change which has taken place in our interpretation of the functional relationship of the state department of education is one of the significant developments of educational administration in recent years.

Acceptance of Basic Principles

Of marked influence in the growth of state departments of education has been the acceptance of the basic principle that education is a state rather than a local function. Only gradually did we reach a full realization of the inadequacy of those primitive educational institutions which were set up in the early days. With the increasing demands of a scientific civilization on the efficiency of the individual, and with a social organization demanding reasonable intelligence on the part of the citizens, the state has been compelled to protect the interests of the individual in the development of his capacity and talents, and at the same time to insure reasonable security and protection to society.

Previous to 1890 the duties of the state superintendent of public instruction were largely clerical or secretarial in character. He was required to present an annual report to the state legislature giving certain data regarding the schools. It was usually through his office that state school funds were handled, but these amounts were relatively small and necessitated only a small clerical staff. The larger professional responsibilities and the demand for educational leadership which have developed in recent years have given a new meaning to education as a primary function of the state, and with this changing interpretation of functional responsibility strong state departments of education have been established in the more progressive states throughout the country.

It must not be assumed that a highly organized state department of education carries with it highly centralized control of authority. A clerk in a small state department with power to pass on school-building plans may have a higher degree of central control than an entire division of school buildings in a large department of education in another state where the service is largely advisory. The latter situation fosters constructive service and professional leadership, while the former is bureaucratic in fact and often worthless in character. Fortunately it is this leadership in state school administration which has characterized the past few decades.

Changes in State School Administration

The developments which have taken place in state school administration in recent years are well illustrated in the marked changes in state education departments. The rapidly increasing importance of the state department is noted in the total number on the staff. In many states the staff of the department consisted of only two or three members. The total staff members in all states in 1890 numbered only 129. The increase in staff membership has been phenomenal, especially since 1915. State departments have been reorganized, and the type of service has been greatly extended. A careful estimate of this number at the present time in the various state departments indicates that it now exceeds 1,900 members. There are several states today in which the state department membership is more than the total of staff members in all state departments in 1890.

It is, however, not so much in mere numbers but rather in its functional relationship to the schools of the state and to the people of the commonwealth that these marked changes in state departments of education become significant and take on purposeful meaning. There is opportunity in this brief summary to point out only a few of these new functions which have characterized recent developments in state school administration, and which have therefore been significant in the growth and reorganization of state education departments.

Advance in Classroom Technique

Few movements in the field of education have been more far-reaching in their results both in classroom technique and in the larger problems of school administration than the developments during the past few decades in the scientific study of education. This interest has not been confined to research students. It is widely discussed by supervisory and teaching groups as well as by the layman. As an illustration of this, one may only point to the character of the articles on public education which appear from time to time in the daily press. The relation between the development of the scientific study of education and school administration has had a profound influence on the service that is being rendered by state departments of education. In this connection the following statement from Counts may be of interest:

"Without doubt the finest educational fruit which the practical sense of the American people has borne is the movement for the scientific study of education. Discarding the older purely speculative approach to the problems of the school, which was never in harmony with their spirit, they began near the close of the last century to apply the scientific method to the study of the learning process. From this simple beginning the movement spread from field to

NEW YORK STATE EDUCATION BUILDING, ALBANY, NEW YORK

The New York State Education Building was erected in 1912 and provides accommodations for the entire administrative staff of the New York State Education Department. It may be said that this magnificent structure devoted to the interests of public education in the Empire State gives some indication of the growth and function of state school administration in this great commonwealth.

field until today there is practically no division of the educational domain which has not been touched."[1]

Scientific Approach to Problems

It is this scientific approach to the whole problem which has influenced more than any other single factor the function of the state department of education. Even though the state may delegate the direct administrative control to the locality, the state department is the logical clearing house regarding progressive experimentation in every phase of public education. Furthermore, the scientific study of education has revolutionized our thinking regarding desirable standards in instruction and supervision as well as in school administration. The advisory service which a state department of education may render in these fields becomes a powerful factor in the development of local educational units. Whether the scientific study of education is our "finest educational fruit" may be questioned. It has been a means to an end rather than an end in itself. It has made large contribution toward the attainment of far richer objectives in the learning process, and is closely related to the enlarged services which state departments are now offering to teaching groups and to local communities.

Emphasis on Teacher Training

The increasing emphasis that is being given to teacher training is an illustration of the change which has taken place in the function of state departments of education in recent years. At the beginning of this period there was nothing worthy of designation as a state program of teacher training. Teacher training and teacher certification were largely local matters. State normal schools were inarticulate, had not found their place, had no respectable entrance requirements, and their courses of study were a hybrid between a high school and a "teachers' institute." Recognizing the inadequacy of such local and spasmodic efforts, the state took the situation in hand. The responsibility of insuring a thoroughly trained teaching staff became a function of the state. The professional service which state departments of education are rendering in meeting this responsibility is of a superior character.

In considering the newer function of state departments of education, research cannot be omitted. This is, of course, closely related to the developments in the scientific study of education. Rapid progress is to be noted in the contribution which research is making to every phase of state school administration. The large body of factual material in connection with every major problem becomes available for the determination of future policies only through the technique of research.

In its beginnings research in the field of education developed largely through the peculiar interests or whims of the individual investigator. Fortunately that period is now passed. Educational research is now being capitalized as a great asset for the improvement of public-school organization and administration. It is now recognized that problems of research in education as well as in the industrial world should be determined by the major functions and purposes of a school in a social democracy. State departments of education are utilizing this new technique in the major service which they are rendering to the school units throughout the state.

Acceptance of Research Idea

Up to the present only the larger and more highly developed state education departments have established divisions of research. Nevertheless, the place of research in the state departments of education is widely accepted and its influence on the functional relationship of state departments to the public-school system is one of the most significant developments in state school administration in recent years.

Any brief treatment of such a broad theme is at best somewhat unsatisfactory. It is obvious that the growth of a state department of education or its size is of far less importance than the service which it renders. Fortunately we are now stressing the function rather than the structure. The greatest and most significant change which has taken place in recent years in state school administration has been the development of a new attitude toward coöperative responsibility between state and local authorities in insuring equality in educational opportunity.

This relationship will change from time to time as the educational needs of the state increase. An increasingly complex social and industrial organization demands an increasingly difficult and varied educational program. Only as the state department coöperates with the local community, bringing to the local authority the best experience from other communities and from other states, offering to the locality the results of scientific research in various phases of school administration, with an appreciation of local difficulties as they arise, but with constructive suggestions for their solution; only as the state and local authority recognize their relationship as essentially coöperative will the schools render their full service toward the attainment of our ideals of democracy.

[1]Counts, *The American Road to Culture*, p. 169.

Forty Years of State Superintendency

Francis G. Blair, State Superintendent of Public Instruction, Illinois

The forty years just closing have seen very little change in the method of selecting the head education officer of the state. The New England states and some of the Middle Atlantic states which provided in their constitutions or laws for the appointment of practically all state officers besides the Governor, began early to provide some method of appointment for their head education officers. Tennessee, Ohio, and Minnesota are the only states west of the Alleghenies to try the other plan. Ohio went from an elective state superintendent to one appointed by the Governor with the adoption of its new constitution a few years ago. Iowa tried the appointive plan and went back to the elective. There has been a marked improvement in the qualification and character of the head education officers in the twenty-eight years I have been meeting with them in national councils.

These forty years have seen the office of the superintendent of public instruction enlarge from a little corner in the Capitol building with a clerk and a stenographer to great offices, with assistant supervisors, directors, and agents to touch the educational affairs of the state in many intimate helpful ways. As late as 1906 the Illinois office consisted of the superintendent of public instruction, one assistant in law, one general assistant, one clerk, one stenographer, and a messenger. Today this office, including the vocational and rehabilitation work, has nineteen assistant superintendents, supervisors or directors, ten clerks, nineteen stenographers, and four messengers, and Illinois has one of the relatively small official forces as compared with states like Pennsylvania, New York, and Ohio.

Gain for Rural Education

The work of the office has expanded greatly in the direction of helpful supervision of the rural schools. In 1907 the first rural-school supervisor to be employed in any state education office was appointed by the superintendent of public instruction in Illinois. Under his guidance the standard one-room school movement was inaugurated, stimulating local pride to build better, more sanitary buildings, provide better heat, lighting, ventilating and seating, better libraries, better courses of study, and better teachers. A new type of one-room school building was fashioned by the state architect and about 4,000 one-room schools have built buildings following that plan.

Under his leadership in 1913 the legislature passed the safety and sanitation law which required that all school buildings in the state, in the cities as well as all the rural districts, should comply with certain minimum standards relating to sanitation and safety set by the superintendent of public instruction. The standard school idea spread from one state to another until the idea has practically been used in every state in the Union. A similar plan was formed for a superior one-room school that provided practically all the physical accommodations of the best city school.

NOTE. The story told by Mr. Blair, as applied to the State of Illinois, is typical of many other states. While it touches inferentially upon the progress made in other states, it holds itself more concretely to the things accomplished in one state and thereby presents a fairly accurate picture of the whole. — The Editor.

Strengthening Official Connections

The head education office in each state usually has official connections with the state university, the teachers' colleges, and other institutions of higher learning. In Illinois this has given the superintendent of public instruction an opportunity to exert a widening influence on the training of teachers and the trends of thought in education. The superintendent of public instruction is a member of the board of trustees of the state university and the board in control of the five teachers' colleges.

The forty years under consideration have seen a great improvement in the relationship of the head education officer of the state to the head officers in the counties of the state. In Illinois, conferences are held with the county superintendents each year, in which matters of common interest and state-wide programs are discussed.

The most notable expansion in the office of the state superintendent or commissioner of education in these forty years has been in the equipment of his office for supervision. Some states, like Pennsylvania, have had a very remarkable expansion in their office force and in the number of contacts they make with the school activities of the state. In that state the office was equipped with supervisors of subject matter — supervisor of geography, supervisor of music, etc. In most other states the supervision has been of units or different phases of educational organization, such as supervisors of rural schools, supervisors of elementary schools, supervisors of high schools. However, in practically all of these offices vocational and physical education have brought in the supervision of subjects.

Many of the state offices within these forty years have expanded their influence and helpfulness into many fields that lie outside of the more restricted field of education. The New York office is typical of several others in its expansion in the field of adult education with a comparatively large force of persons actively engaged in that great work.

Many Changes and Innovations

The past forty years have witnessed the transfer of the certificating of teachers in many of the states of the Union from the county superintendent to the superintendent of public instruction. Almost all of the state offices are practically the only certificating authority within the state and have large office forces for administering this large service.

Teachers' pension and retirement funds have come into being within the period under consideration, and in many states like Illinois where there is a state teachers' pension and retirement fund it centers in the office of the superintendent of public instruction and enlarges the variety and scope of his work.

Within these forty years many education offices have undertaken the publication of annual circulars which have to do with special phases of education. For over thirty years Illinois has issued a Memorial Day circular and an Arbor and Bird Day circular. These are published at the expense of the state and sent to the teachers of the state, the one relating to the memorial days, patriotic days, and the other to outdoor life.

There is one marked distinction between the education offices in their development within the past forty years. In some of the states, especially east of the Alleghenies, a high degree of centralization has been maintained from the very time of the organization of those offices. In most of the other states, especially the Middle Western states, a high degree of decentralization has obtained from the very beginning of the organization of their school systems. In Pennsylvania and New York, for instance, the authority and direction of the state education office is more pronounced and more effective than in such states as Illinois, Iowa, or Nebraska.

An important event in the state superintendency within this period has been the organization of the National Council of Superintendents and Commissioners of Education. This council in its close relationship with the National Commissioner of Education has been able to formulate nation-wide conceptions and policies which have effected substantial changes throughout the nation.

Forty Years of Progress in State Policies of Financing Public Schools

Fletcher Harper Swift, Professor of Education, University of California at Berkeley

It is not difficult for those interested in teacher training, curriculum making and methods of instruction, to furnish convincing proof of the great progress that has been made during the past four decades. However, the case is somewhat different when policies and methods of financing public schools are under consideration. Educational leaders generally feel it necessary, as a means of stimulating the public to the adoption of needed reforms, to call attention to the defects in our fiscal policies and the resultant dark spots in our educational situation. Nevertheless, it may be doubted whether the progress in fiscal policies is not almost so great as that in any other field of educational effort.

The importance of progress in public-school fiscal policies becomes evident the moment we consider its relation to other lines of educational progress. The enforcement of compulsory-education laws was impossible in backward states until financial policies had been reformed, and funds adequate for maintaining the necessary schools had been provided. Modernized curricula, scientifically planned and constructed school buildings, elimination of unnecessary school districts, establishment of children's clinics, the establishment of playgrounds, the provision of health service, the triumph of the American high school and the rise of junior colleges, all in the last analysis, are possible only through the increase of school funds and the proper distribution of the same. From this brief consideration of the situation, let us now turn to the specific achievements which characterize the past forty years.

Increasing Generosity Toward Public Schools

Perhaps the achievement which merits first consideration is an ever-increasing generosity in financing our public schools. In 1890 only 64 per cent of pupils enrolled in our public schools were in attendance on any average school day; in 1928 the proportion had been increased to 82 per cent. In 1890 the average length of the school year was 135 days; in 1928, 172 days, an increase of nearly two months within four decades. The expenditure per pupil in average daily attendance in 1890 was $17; in 1928, $106, an increase of 515 per cent. The total expenditure for public elementary and secondary schools in 1890 was approximately $140,000,000; in 1928, $2,184,000,000, an increase of 1,454 per cent.[1]

[1]1928 is the latest year for which, at the present writing, statistical data covering the entire United States can be secured. Consequently, it is necessary to take as our period, 1890–1928. The comparative data presented in the immediately following paragraphs are taken from "Biennial Survey of Education, 1926–1928," *Office of Education Bulletin, 1930*, No. 16, pp. 452, 453. The per cent of increase in average daily attendance, total expenditure, and expenditure per pupil in average daily attendance, has been computed.

Such vast increases in expenditure bear eloquent testimony to the extension of free public education to an ever-increasing proportion of our population. They tell the story of an ever-growing conception of what our public schools must endeavor to do for the millions of children, who, year by year, pass in and out of their schoolrooms. They bear witness, not only to an expansion of curricula, and to new types of instruction, but to the provision of a multitude of facilities almost undreamed of by educational directors four decades ago.

The facilities which it has been possible to add through these vast increases in expenditure, include school doctors, school nurses, dental clinics, psychological clinics, open-air schools, supervised play, special schools and classes for blind, deaf, crippled, and mentally backward or deficient children, truant officers, home-visiting teachers, city systems of public kindergartens, extensive programs of health education, continuation classes for minors engaged in industry, and many other new factors. In 1890, the average annual salaries of all teachers in the United States was $252 a year; in 1928, $1,364.

It is due to a new generation of teachers, made possible through more adequate salaries and consequently more adequately trained, that the school has created a new world for the children of today. Forty years ago, and long thereafter, a favorite ditty sung by school children on the last day of school was, "No more Latin, no more French, no more sitting on a hardwood bench." Today, taking the United States as a whole, the school is one of the strongest forces insuring to every child, childhood's inviolate right to happiness, and the last day of school, far from being an occasion of joy, is often one of regret.

FORTY YEARS AGO AND NOW

PUPILS. Total number of pupils in 1891 in all grades, public and private, 14,669,069, the same being 23.09 per cent of the total (63,521,196) population.

1931 — The total number of pupils in 1928 reached the sum of 20,608,353. The estimated number in 1931 is 23,000,000.

TEACHERS. Number of teachers in 1891 in public schools 368,791, one third being males. Adding 60,000 teaching in private and parochial schools, brought the total to nearly 425,000.

1931 — The number of teachers employed in the United States in 1928 was 831,931. The estimated number in 1931 is 900,000.

SCHOOL COSTS. The total expenditures for public schools during the year 1891 was reported at $146,800,163. This was $17.67 for each pupil attending 135.7 days, and $2.31 per capita of the whole population. Of the income for schools, nearly 70 per cent comes from local taxes, and 19 per cent from state taxes. If the expenditure for private schools is added, estimating it at $28,000,000, the total expenditure for education aggregated $175,000,000.

1931 — The total expenditure for public-school education for 1928 was $2,184,336,638. The estimated figure for 1931 is $2,500,000,000. The total number of school buildings in use in 1928 was 254,726. The value of all property used for public-school purposes in 1928 was $5,486,938,599. Estimated value in 1931 $6,000,000,000.

New Conception of State Responsibilities

A second aspect of state policies of public-school finance in which notable progress has been made during the past forty years, is revealed in a gradually expanding and deepening conception of the nature and extent of state responsibility. At the opening of this period the responsibility of establishing, directing, and supporting schools was regarded as an essentially local affair. The state might, if it chose, assist local communities, but in the last analysis it recognized no financial responsibility.

As long as such a conception of state responsibility prevailed, it was regarded as satisfactory to apportion state funds among minor civic divisions, on the basis of school census, or even total population. As the result of numerous reports and studies of state school systems and methods of state school finance, there has gradually evolved within the past fifteen years, a belief that the state can no longer leave to the local unit the responsibility of providing a minimum education opportunity for every child. On the contrary, the state as the final authority in education, must take into consideration, not only the willingness, but the relative ability of its minor civic divisions, to whom it has delegated educational responsibility and the execution of its own educational functions.

Rise of Equalization Funds

As a result of this new extension in the conception of state responsibility, one state after another has attempted to establish a fund, commonly known as an "equalization fund," to be distributed by a method which takes into consideration differences in financial ability and educational needs.

One of the first states to espouse such a policy was Colorado which, in 1913, provided for setting aside out of the income of her permanent public-school fund, a sum not to exceed $60,000

to be used to pay districts unable to derive from all other state, county, and district sources, a sum sufficient to pay each teacher employed a salary of at least $50 a month for six months. In 1920, Mississippi increased her state common-school appropriation 60 per cent and placed all this increase in an equalization fund. In 1921, Maine, Michigan, and Minnesota enacted legislation providing for equalization funds or grants. In 1922, Maryland enacted what was undoubtedly the most significant equalization fund plan thus far formulated and one which still remains one of the most feasible of all plans.

The movement once under way, rapidly gained momentum and public favor. In the year 1930, there were only fourteen states which had not either created equalization funds or provided for equalization school grants, to be paid out of some other state fund. At the present writing, three of these fourteen states, California, Oregon, and Utah, are agitating the establishment of such funds.

Progress in Tax Policies

The raising of the standards of educational provisions and the consequent necessity of providing vastly larger funds, has led to a careful scrutiny of the sources employed by states in providing public-school revenues. Forty years ago, almost the only type of tax employed as a device for providing state school revenues, was the general property tax. Today, although the general property tax still remains the most widely employed of all state taxes as a source of public revenue, the injustices which it imposes are universally recognized and have been greatly relieved in many states by the adoption of newer types of taxation. Seven states now levy for school purposes a tax (commonly known as a severance tax) on oils, minerals, timber, and other natural products other than agricultural, severed from the soil.

A like number of states employ state personal-income taxes as a source of school revenue. Five states employ a state tobacco tax as a means of furnishing school funds. Thirteen use corporation taxes for the same purpose.[2]

The majority of states which have adopted the personal-income tax have been led to do so in part by the desire to reduce the burden placed on general property. A number, notably, Arkansas and Wisconsin, have enacted laws which definitely provide that a portion of the proceeds shall be used for this specific purpose.

The corporation tax, like the personal-income tax, has been introduced by a number of forward-looking states as a means of reducing state taxation of real and personal property. California, North Carolina, and Virginia each formerly levied a state general-property tax for the benefit of public schools. This tax has now been discontinued in each of these states and a state corporation tax resorted to as the major source for providing state school revenues. This change took place in California in 1910, in North Carolina in 1920 and in Virginia in 1926.

Four Experiments in Complete State Support

In 1890, approximately $24 out of every $100 provided for public schools in the United States was furnished by state funds; in 1928, approximately $16.50. In 1890, school districts, counties, and other minor civic divisions of the states furnished approximately 68 per cent of the total monies provided for public schools, and in 1928, they supplied 79 per cent. The disastrous results of this tendency to place a larger and larger proportion of the total school burden upon thousands of small, weak, and in many cases poverty-stricken school units, has been revealed by many careful studies of state fiscal policies, with the result that a number of states have adopted definite measures to counteract this trend. Of these, Delaware undoubtedly offers the most interesting example. In 1919 this state abolished school districts and established in their stead a county unit system.

The advantages of the larger school unit became immediately manifest with the result that in 1921 Delaware established, in place of her county units system, a state unit under which all communities of the state, with the exception of the city of Wilmington, are now supported entirely from state funds. Of all the states in the Union, none has been more adverse than Massachusetts to the assumption by the state of any appreciable portion of the school burden. This attitude is responsible for the fact that as late as 1915 in Massachusetts, the state was furnishing less than 2 per cent of the public-school revenue. In 1919, Massachusetts frankly recognized the necessity of reversing her century-long policy, and provided for setting aside a portion of the proceeds of the state income tax (created in 1916) as an annual current fund to be known as the General School Fund. As a result, in 1920 the state furnished no less than 12.3 per cent of the total public-school revenues.

Three New England states have adopted policies under which school units, formerly deriving the major portion of their support from local sources, may come under the direct jurisdiction and control of the state and may be supported largely, if not entirely, by state funds. In Maine 48 per cent of the area of the state lies within unorganized territory. The state provides all funds for schools in such territory except that derived from the proceeds of local poll taxes.

Rhode Island, by recent law, provides that the state board of education may, at the request of any town, and if convinced that the local school revenues are inadequate, become responsible for paying all school costs and assume complete control, supervision, and management of all schools maintained within the town. The only burden placed upon the town is that of providing a sum equal to the proceeds of a 3-mill tax. In New Hampshire the state board of education administers and accounts for all monies both state and local, of districts aided from a state equalization school fund. As much as 54 per cent of state aid in New Hampshire in 1926 was devoted to the public-school equalization fund.

Budget Systems Adopted

An effect of vastly increasing expenditures for public schools, fully as important as any thus far mentioned, has been the careful scrutiny and justification of the expenditures themselves. The recognition of a need for such scrutiny and justification has led within the past three decades to a gradual development of state and local systems of budget making and accounting.

This development reached a status of definitely recognized national significance as early as 1899 in a report on uniform financial reports prepared by a committee of the National Education Association. A report on the same subject by a committee of this organization presented in 1911, proved to be a epoch-making document in the development of city school finance. The final report of this committee was published in 1912 by the United States Bureau of Education as Bulletin No. 3 of that year.

The influence of the budget and accounting movement can best be understood when it is recalled that at the present time a very large number of our states require all minor civic divisions to submit to higher educational authorities for scrutiny and approval the budgets of their respective local units.

Progress in Federal Policies

In certain fields of educational endeavor, the progress of our states during the past two decades has been inseparably connected with policies initiated by the federal government. This is notably true in the field of vocational education. The passage of the Smith-Lever Act approved May 8, 1914, provided federal subventions available to the states for the promotion of extension work in agriculture and home economics. Although none of the subventions are available to public schools, yet an important feature of the Smith-Lever activities is the organization of county clubs for boys and girls of school age under the direction of county agents. In 1920 there were no less than 2,359 county agents engaged in such work.

This act makes available for apportionment among the states an annual fund of $5,880,000 which, with the exception of a grant of $10,000 per state, must be matched, dollar for dollar, from sources within the receiving commonwealth

On February 23, 1917, was passed the Smith-Hughes Vocational Education Act which marked the entrance of the Federal Government upon a national policy of subsidizing vocational education in public secondary schools. Prior to the passage of this Act, only three states in the Union, Wisconsin, Pennsylvania, and Massachusetts, had made any notable provision for vocational education within their systems of public-school education. Before January 1, 1918, every state had accepted the provisions of the Act with the result that the total expenditure for vocational education in schools subsidized from Smith-Hughes funds increased from approximately $3,000,000 in 1918 to $11,000,000 in 1921.

CITY SUPERINTENDENTS FORTY YEARS AGO

The leading city school systems were headed forty years ago with the following superintendents:

New York City, John Jasper
Chicago, Albert G. Lane
Philadelphia, Edward Brooks
Boston, Edwin P. Seaver
Pittsburgh, George J. Lockey
St. Louis, Edward H. Long
Cincinnati, William H. Morgan
Buffalo, Henry P. Emerson
Detroit, W. E. Robinson
Milwaukee, George W. Peckham
Birmingham, J. H. Phillips
San Francisco, James Swett
Los Angeles, W. M. Friesner
Denver, Aaron Gove, L. C. Greenlee, J. H. Van Sickle
Hartford, John H. Brocklesby
Pensacola, Fla., N. B. Cook
Atlanta, W. F. Slaton
Indianapolis, L. H. Jones
Louisville, George H. Tingley, Jr.
New Orleans, Warren Easton
Baltimore, Henry A. Wise
Springfield, Mass., Thomas M. Balliet
St. Paul, Charles B. Gilbert
Minneapolis, C. M. Jordan
Duluth, R. E. Denfeld
Omaha, Frank A. Fitzpatrick
Jersey City, Henry Snyder
Albany, N. Y., Charles W. Cole
Syracuse, A. B. Blodgett
Columbus, Ohio, J. A. Shawan
Toledo, Harvey W. Compton
Cleveland, A. S. Draper
Reading, Pa., Samuel A. Baer
Providence, Horace S. Tarbell
Chattanooga, A. T. Barrett
Memphis, Charles H. Collier
Nashville, Z. H. Brown
Dallas, T. G. Harris
Houston, W. S. Sutton
Salt Lake City, J. F. Millspaugh
Richmond, William F. Fox
Seattle, Frank J. Barnard.

[2]Data taken from Fletcher Harper Swift, *Federal and State Policies in Public School Finance*, Table XLIV, pp. 186, 187. Ginn and Company, 1931. (*In press.*)

Advocates of federal aid in 1918 attempted to extend the policy from the limited field of vocational education to that of general aid for public schools. This effort was given form in the so-called Smith-Towner Bill which sought to provide an annual federal fund for distribution among the states. This bill failed of passage but has been followed by a succession of bills attempting to embody in revised form the major aims and principles of the Smith-Towner Bill.

In 1929 no less than four bills, all of which failed of passage, were introduced into Congress, namely, the Brand Bill, the Glover Bill, the Nye Bill, and the Selvig Bill. Each of these bills provided for a federal public-school annual fund of $100,000,000.

The bitter conflict waged about the Smith-Towner Bill and its successors show clearly that any attempt to inaugurate a policy of large federal aid will meet with bitter and well-organized opposition. However, if these bills have served no other purpose, they have focused the attention of the citizens of the United States upon the great inequalities in educational opportunity existing among our states, collectively and individually.

Whatever may be the final attitude of our national government toward these problems, the steps thus far taken toward a clarification of the relation of our national government toward the educational responsibilities of the states, constitute an important achievement with respect to an intelligent approach to our sound fiscal policies.

Rise and Contribution of Private Foundations

Although the present article is concerned primarily with public policies in financing educational institutions, nevertheless, more than passing attention must be given to the rise within the past two decades of a number of richly endowed private foundations which have made most important contributions, not only to the general progress of education, but to the scientific formulation and application of sounder fiscal policies. These contributions have been made in part by subsidizing scientific studies bearing upon the problems of school support, and in part by subsidizing school projects.

Among the most important of these private foundations are the John F. Slater Fund, organized in 1882; the General Education Board, organized in 1902; the Carnegie Foundation for the Advancement of Teaching, organized in 1906; the Russell Sage Foundation, organized in 1907; the Anna T. Jeanes Fund, organized in 1908; the Carnegie Corporation of New York, organized in 1911; the Phelps-Stokes Fund, incorporated in 1911; the Rockefeller Foundation, organized in 1913; the Julius Rosenwald Fund, organized in 1917; the Laura Spelman Rockefeller Memorial, organized in 1918; the Commonwealth Fund, organized in 1918; the Payne Fund, organized in 1927. From funds provided by the above private foundations, school buildings, libraries, teachers' homes in rural districts, salaries of state school inspectors, and model and experimental schools have been made possible.

The Julius Rosenwald Fund is available for building and equipping rural schools for Negroes, and teachers' homes. In the seventeen years during which its revenues have been available, this fund has contributed no less than $25,342,272 to fourteen southern states participating therein.[3] Space does not permit an account of the multitude of activities of these various foundations directly affecting the problems of school finance. The General Education Board alone has not only largely subsidized many important educational surveys, but following these surveys, has provided the revenues necessary to carry out in practice the reforms recommended by the survey. The study of the system of school support of the State of Arkansas made by the writer in 1922, showed that at the time the General Education Board was providing 52 per cent of the cost of maintaining the state department of education in Arkansas.

[3]Edwin R. Embree, *Julius Rosenwald Fund. Review for the Year.* Chicago, 1930, p. 17.

STATE SUPERINTENDENTS FORTY YEARS AGO

The following served as state superintendents of public instruction in the year 1891:

Alabama, J. G. Harris
Alaska, Sheldon Jackson
Arizona, George W. Cheyney
Arkansas, Josiah H. Shinn
California, J. W. Anderson
Colorado, J. F. Murray
Connecticut, C. D. Hine
Delaware, Robert J. Reynolds
Florida, W. N. Sheats
Georgia, S. D. Bradwell
Idaho, B. Byron Lower
Illinois, Henry Raab
Indiana, H. D. Vories
Iowa, J. B. Knoepfler
Kansas, H. N. Gaines
Kentucky, Ed Porter Thompson
Louisiana, A. D. Lafargue
Maine, N. A. Luce
Maryland, E. B. Prettyman
Massachusetts, J. W. Dickinson
Michigan, Henry R. Pattengill
Minnesota, D. L. Kiehle
Mississippi, J. R. Preston
Missouri, L. E. Wolfe
Montana, E. A. Steere
Nebraska, A. K. Goudy
Nevada, Orvis Ring
New Hampshire, Fred Gowing
New Jersey, A. B. Poland
New Mexico, Amado Chavez
New York, James F. Crooker
North Carolina, John C. Scarborough
North Dakota, Mrs. Laura J. Eisenhuth
Ohio, Oscar T. Corson
Oklahoma, J. H. Parker
Oregon, E. B. McElroy
Pennsylvania, Nathan C. Schaeffer
Rhode Island, T. B. Stockwell
South Carolina, W. D. Mayfield
South Dakota, Cortez Salmon
Tennessee, Frank M. Smith
Texas, J. M. Carlisle
Utah, J. S. Boreman
Vermont, Mason S. Stone
Virginia, John E. Massey
Washington, C. W. Bean
West Virginia, Virgil A. Lewis
Wisconsin, O. E. Wells
Wyoming, S. T. Farwell.

School Finance Becomes a Science

In school finance, as in other fields of human endeavor, genuine progress is possible only through the scientific formulation of principles and the application of these principles to concrete situations. Should a complete history ever be written of the achievements within the field of public-school finance from 1890 to 1930, it would probably contain no chapter more stimulating and more worthy of praise than that recording the gradual evolution of scientific studies within this field.

At the beginning of this period, indeed as late as 1904, there was almost no scientific literature in this field and almost no validated techniques. In the year 1905, however, a notable beginning of scientific studies was made by the publication of Cubberley's *School Funds and Their Apportionment,* Elliott's *Fiscal Aspects of Public Education,* and Strayer's *City School Expenditures.* These were soon followed by Swift's *History of Public Permanent Common School Funds in the United States,* 1911, and Stewart's *Coöperative Methods of School Support,* in 1914.

The years between this latter date and 1931 have been marked by an ever-increasing output of careful and significant studies, including a series of *Studies in Public School Finance* prepared under the direction of the writer and published by the University of Minnesota, 1922–1925, and a series of monographs produced by the Educational Finance Inquiry Commission devoted to an intensive study of the fiscal problems and policies of a number of selected states. We may well close this array of scientific works with reference to Mort's *Measurement of Educational Need,* and to Fowlkes's *School Bonds,* and McGaughy's *Fiscal Administration of City School Systems,* all published in 1924, and Morrison's philosophical treatment recently issued under the modest title of *School Revenue.*

Importance of Problem Gains National Recognition

One of the most significant features in the history of school finance during the past 25 years is the gradual awakening on the part of the public to a realization that no problem in education is more important than the problem of school support. If one turns to the annual volumes published by the National Education Association, he discovers that in the year 1890 the subject of public-school finance was given little, if any, place in the deliberations of this body, either at its general sessions or at the meetings of the Department of Superintendence. The topics under discussion at that time related chiefly to child study, teacher training, discipline, and curricula.

In the program of the National Education Association for the year 1915, the problem of school finance is given a place, albeit a minor one. But from 1915 onward, the subject of public-school finance occupies a larger and larger place, not only in the programs and deliberations of this, our greatest national education association, but in that of every education organization and association. More recently the national importance of the school fiscal policies of our individual states has been recognized in a number of attempts at nation-wide surveys of this problem.

As long ago as 1915 the writer suggested the desirability of a nation-wide study of public school support and attempted to make a beginning of meeting this need by the publication of the series of studies in public-school finance already noted. The work of the Educational Finance Inquiry Commission was the second step in this direction. At the present writing the United States Commissioner of Education, Dr. William John Cooper, is endeavoring to secure a grant from Congress to subsidize a nation-wide study in this field.

What of the Future?

The consideration presented in the preceding paragraphs has been limited almost entirely to a record of past progress. What shall be said regarding the present situation and the promise for the future? It may well be answered that despite the remarkable achievements of the past four decades, the science of school finance is still in its infancy.

Only recently has the importance of this field and the fact that it is fundamental to all educational progress and to the realization of our nation's supreme social and spiritual ideals begun to be appreciated. Throughout the United States today, city, state, and national organizations, commissions, and scientific students of educational problems are working with a zeal and a devotion unsurpassed. On one hand the extreme individualist or the self-seeking opportunist declares that public education has exceeded all legitimate bounds and demands retrenchment.

(Concluded on Page 118)

The Nation's Office of Education

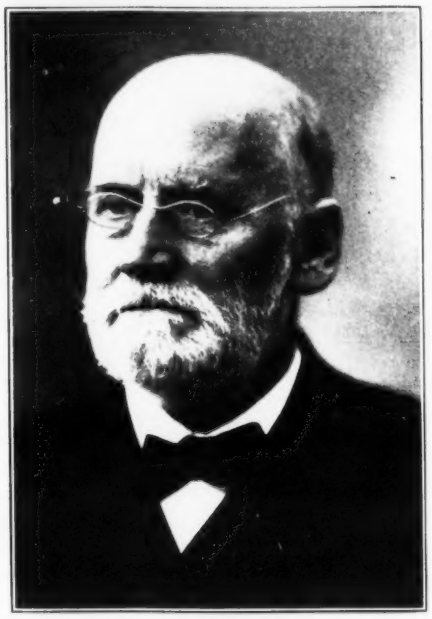
Written Especially for This Issue of the JOURNAL by a Member of the Office Staff

It might almost be said that the AMERICAN SCHOOL BOARD JOURNAL and the Office of Education have grown up together, despite the fact that the legal existence of the Federal organization is 24 years longer. When the first issue of the SCHOOL BOARD JOURNAL was published in March, 1891, the fourth Commissioner of Education, Dr. William Torrey Harris, had been in office only two years and under his administration it was destined to achieve a prestige which it had not previously known. This the new magazine promptly recognized. Although it gave its paper almost exclusively to the business of school boards and to pictures of distinguished members of such boards, the issue of June, 1891, carried a very fine portrait of Commissioner Harris.

During his long administration of seventeen years, Dr. Harris emphasized the aim of education as "a process of conscious evolution and . . . the only rational, reliable agency by which man may work out his destiny in harmony with the will of the Divine Being."[1] Accordingly, he put much emphasis upon the necessity of the study of philosophy as a basic subject; he was a leader in the movement to reject the old psychology and to develop a new psychology based upon child study. He was convinced that much progress could be made through the study of comparative education and accordingly fostered compilation and publication of monographs on the educational systems of foreign countries. When Dr. Harris resigned on June 30, 1906, he was succeeded by Dr. Elmer Ellsworth Brown, head of the department of education at the University of California.

Dr. Brown's reputation as a distinguished student of the history of education had already been established. An important feature of his administration was the expansion and reorganization of the bureau's library; a work which has been continued by his successors as funds and facilities permitted. In addition, Dr. Brown began publication of a series of bulletins which has been continued to this day. To the office staff he added two divisions which indicate his larger conception of the function of the office: School administration and higher education. Specialists in school administration, in higher education and in land-grant college statistics were employed. After five years' service Commissioner Brown resigned to become Chancellor of the New York University and within a month Dr. Philander P. Claxton, of Tennessee, became head of the office.

Claxton outlined his conception of the Bureau of Education, as it was then called, as "a clearing house for accurate and comprehensive information in respect to all educational agencies and all forms of education in the United States and all foreign countries."[2] His administration was marked by a further extension of the services rendered. New specialists were added in such fields as rural education, civic education, industrial education, homemaking education, and commercial education. During his administration came the world war, which made it necessary for the Federal Government to utilize the Bureau of Education in promoting through the schools a better understanding of the war aims of the United States and the development of a spirit of coöperation for victory. A series of bulletins on school and community life was authorized, compiled, and published for use in the classroom. No publications of the Office have ever enjoyed such wide popularity as did this series. During Dr. Claxton's time the annual survey of American education was enlarged and improved and issued biennially. After ten



DR. WILLIAM TORREY HARRIS

years of vigorous service, Dr. Claxton retired from the Commissionership on June 1, 1921, and became Provost of the University of Alabama and afterwards city superintendent of schools at Tulsa, Oklahoma.

Dr. John J. Tigert, of Kentucky, was appointed by President Harding to succeed him. His administration continued the emphasis upon rural education begun by Dr. Claxton, emphasized the Americanization programs, promoted the use of visual devices in education and promoted school organization along the lines of work-study-play plan. Commissioner Tigert accompanied the expedition of President Harding into Alaska and as a result of first-hand information gained on that trip, he reorganized the Alaska service and directed the development of a new course of study.

State and local surveys begun in Dr. Claxton's administration were continued and extended by Dr. Tigert. He also initiated two studies in the field of higher education; first, a study of Negro colleges and universities (Bulletin, 1928, No. 7), which constitutes a volume of nearly 1,000 pages; and second, a survey of land-grant colleges and universities (Bulletin, 1930, No. 9), completed and published after Tigert had retired from the commissionership. On August 31, 1928, Dr. Tigert resigned to accept the presidency of the University of Florida. On February 11, 1929, Wm. John Cooper, state

DR. WILLIAM JOHN COOPER
U. S. Commissioner of Education,
Washington, D. C.

director of education in California, who had been appointed by President Coolidge, took the oath of office. In the interim the veteran chief clerk, L. A. Kalbach, was acting commissioner.

During his first year the office of the commissioner was reclassified to rank and salary equal with the chiefs of other bureaus of the Interior Department, and an assistant commissioner was provided. For these changes the new Secretary of the Interior, Dr. Ray Lyman Wilbur, was responsible. The staff has been reorganized with major emphasis upon intensive research and such publicity as will make the data of most use to the school people of the nation. The chief innovation is a division of major surveys headed by the commissioner in person. Two of these nation-wide studies have been authorized by Congress and are now under way, one in secondary education and the other in teacher education.

Defining Scope and Function

In his report to the Secretary of the Interior for the first complete fiscal year of his administration Commissioner Cooper announced that his reorganization had been made in line with eight general principles:

1. That the reasons for which Congress established the Office of Education, namely, the collection of school statistics and a wide dissemination of information on education, are still valid and should receive chief emphasis by our staff.

2. That such promotional activities as had been assumed from time to time, and chiefly during the war period, should be eliminated as rapidly as possible.

3. That the demand for more fundamental research in education, indicated in part by bills calling for the creation of a Department of Education and appropriations for research, and also by petitions and memorials from organized professional groups requesting investigation of particular projects, is fully justified.

4. That the administrative responsibilities gradually accruing to the commissioner and his staff over a period of some 40 years and arising in particular from the education and medical relief of natives in Alaska should be transferred to other officials as rapidly as possible.

5. That certain service functions gradually developed by the office should be continued partly because they furnish the best means of disseminating information, partly because they furnish the only means of keeping members of our staff in direct contact with actual school problems, and partly because situations arise in local and state governments where an agent of the Federal Government is the only satisfactory person to serve as a referee.

6. That the local autonomy of American education can best be preserved by having in Washington a staff large enough to perform adequately these regular and recurring duties and by augmenting this staff temporarily for the performance of specific technical tasks, as needs arise, from the experts employed in universities and colleges and the public-school system.

7. That such specific tasks be undertaken only at the request of and with the approval of well-established, organized professional groups; and that each project so approved be submitted to Congress on its own merits and carried on with funds provided for that specific purpose.

8. That every effort be made to locate researches now under way in education, to coöperate with the local governments, universities, and volunteer agencies which are making such studies, and, inasfar as possible, to coördinate the efforts of all such groups.[3]

[1] Sutton, William S., *Cyclopedia of Education*, Vol. III, p. 220.
[2] *Annual Report of the Commissioner*, 1915, Vol. I, p. xvii.
[3] *Annual Report of the Commissioner of Education*. For the year ended June 30, 1930, pp. 1–2.

The Story of a Publication

William George Bruce, Founder of the American School Board Journal

With this number this publication enters upon the fortieth year of its existence. It may, therefore, be of some interest to those who have become familiar with its pages to learn something of its beginnings and the successive struggles which have brought it up to its present plane of efficiency, service, and completeness. It represents a life's work of endeavor, of hardships, of industry — all prompted and stimulated by an ideal.

Perhaps the circumstances which evolved the idea of establishing a publication, devoted solely to school administration, should be enumerated. During the years past, the writer has frequently been asked the questions: "How did you conceive the idea of a school-board paper? What prompted you to establish this publication?"

How the Idea Was Conceived

The story, briefly told, is this: The writer had, for a number of years, been employed on daily newspapers where he served in various capacities, both in the editorial and business departments, when he suddenly one day found himself elected to a membership on the local school board.

The elevation to an office which he held in high regard also excited in him the consciousness of an unpreparedness for the duties to be performed. He realized that he must equip himself for the task that was before him. He must study school-board proceedings and educational journals, visit schools and cultivate the acquaintance of teachers, master parliamentary procedure, and, in brief, learn the elementary principles of school administration.

The printed school-board proceedings of many cities and sample copies of many school journals were brought to his aid. He waded through bushels of printed matter without finding in any accessible or tangible form just what he was seeking.

The proceedings of boards of education proved dry and uninteresting reading. The grains of real information were buried in a mass of routine matter of local concern only and difficult to recognize and single out. The school journals dealt almost wholly with classroom methods which were intended for teachers only.

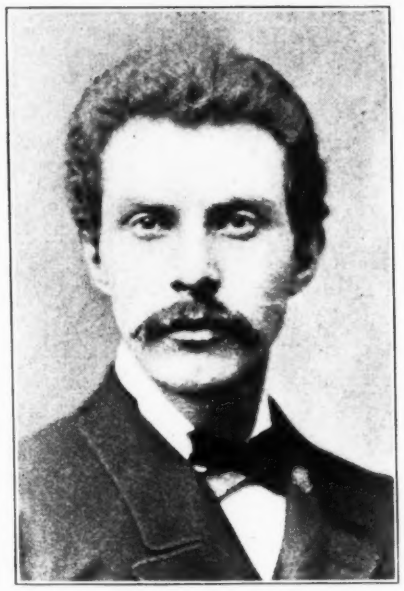
It gradually became evident that there was no publication in the United States that served school-board members; there was no medium that told what the various boards of education were doing, or that dealt with recognized fundamentals in school administration.

Here, then, was presented an uncovered field in periodical literature! Someone should set himself to the task of serving an actual need! There must be thousands of school officers and board members who felt that need just as the writer felt it.

Why not undertake the task? Why not establish a school-board journal? The writer became interested and then enthusiastic. The idea began to grow in his mind. But, there were also serious obstacles! He lacked experience and he lacked money. It would take both to launch a periodical that would prove acceptable to the boards of education. Then there was the danger that even a good publication might prove a financial failure.

A Humble Beginning

But, the prospective publisher reasoned that he could at least produce a periodical that would record the important doings of the various boards of education throughout the United States, publish the best expressions in school administrative thought and thus produce a reasonably valuable medium. With the passing of time, there would also come experience, strength, and stability. As publisher and editor he would have to, and could, become versed in all significant phases of school administration.



THE FOUNDER, WILLIAM GEORGE BRUCE, IN 1891

Thus, in March, 1891, THE AMERICAN SCHOOL BOARD JOURNAL was born. It was a meager affair. The beginning was an extremely humble one. There were eight pages of reading, minus cover pages, an extremely poor halftone portrait and a few small local advertisements, which bore no relation to the school field.

The struggle for existence became hard. The publisher had, in a few months, put every spare dollar into his enterprise; he had a wife and three small children to support, and nothing but this little publication out of which to draw that support. He frequently began his day's work between four and five o'clock in the morning, and frequently did not seek rest until midnight. He was frugal and industrious. His wife practiced rigid economy and self-denial. There was an unflagging confidence that well-directed effort would eventually win.

In the earlier labors in Chicago a representative of a prominent school-supply house saw me one day emerging from a cheap restaurant. I was chagrined in being thus seen, and realized that it in nowise added to my prestige as a publisher. But why deny my poverty? It was true that I began my day's work in Chicago with a ten-cent breakfast consisting of a doughnut and a cup of coffee. It was also true that I could not allow myself more than twenty-five cents for a noon luncheon. Economy here was not a penurious choice; it was a matter of stern necessity.

Some Discouragements and Rebuffs

During the initial period of the JOURNAL the publisher made weekly journeys from Milwaukee to Chicago. The latter city offered at least greater opportunities, if indeed the publication had a future. Here a day's work meant to skirmish about the city for subscriptions and advertising, with the result that when train time came I frequently returned to my home city either with empty hands or with meager returns in the day's work.

Albert G. Lane, the superintendent of the Chicago schools one day said: "There are too many school journals now, and not room for a single one more. Bruce, you better quit, go home and stay there!"

"But there ought to be a field for a publication devoted to school administration," I expostulated.

"There may be, but I doubt it!" he replied.

Some months later I managed to raise enough money to finance a journey to New York City. Through a mutual friend, I secured an interview with one of the members of Harper Brothers, then a leading schoolbook publishing house. When I explained my project Mr. Harper smiled and said:

"There is no future for your project, Mr. Bruce. You are located in Milwaukee, which is merely a beer village. Books and beer do not mix. The educational world will not accept your product. It looks to New York, Boston, and Philadelphia for its textbooks and educational journals."

This was not an encouraging comment coming from one who was regarded as one of the country's leading publishers and whose judgment ought to be authoritative and conclusive. However, I was not discouraged, but found some comfort in recalling an incident which had previously been reported to me during my visit East.

A New York publisher, while traveling westward had met a Milwaukee editor on the train, when the conversation turned to periodical publishing business.

"By the way, do you know a man named Bruce out in Milwaukee who has begun the publication of an educational magazine?"

"Yes, I know him quite well," replied the editor. "He was in my employ. I don't know much about his enterprise, but I do know the man. I have heard it predicted that he would meet with failure, but knowing Bruce as I do, I predict success for him! He is cautious and circumspect, and knows every minute just what he is doing. I have absolute confidence in his vision, his energy, and his perseverance. He will get there if there is half a chance!"

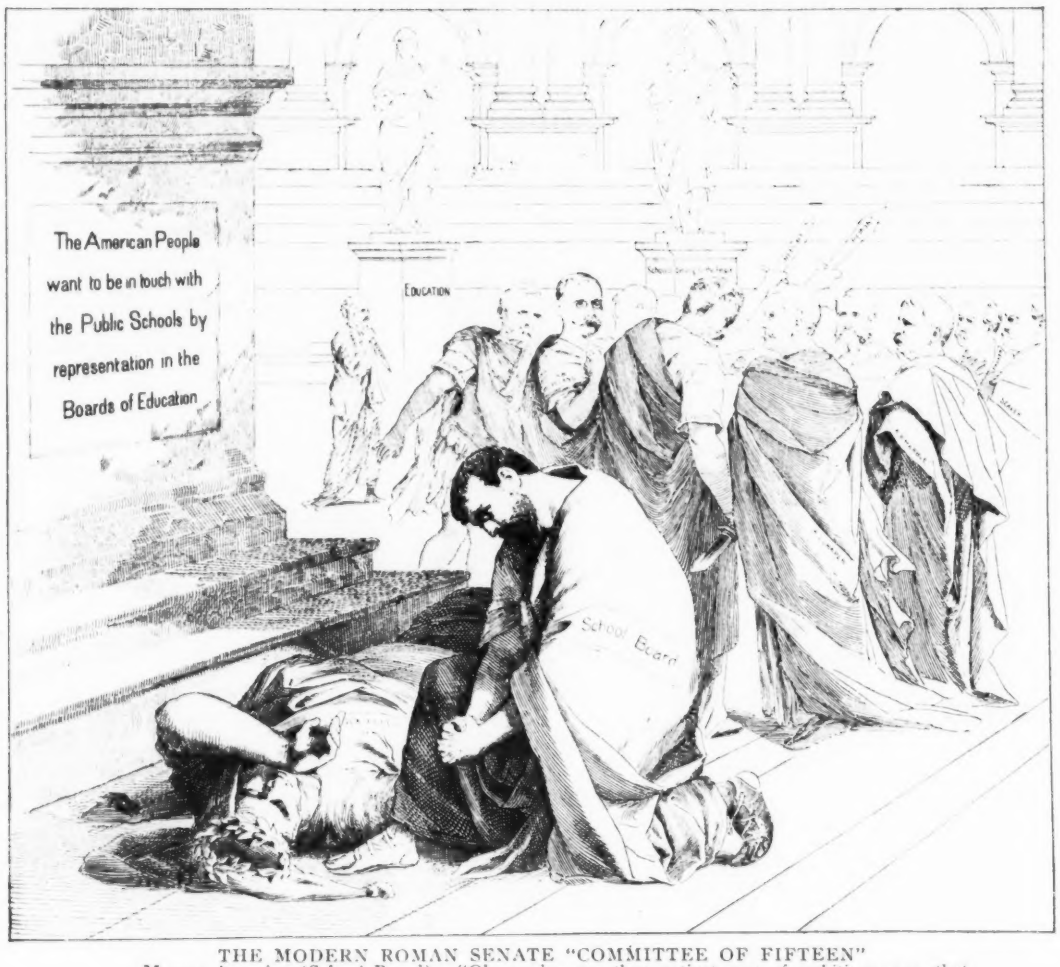
At the end of a year of hard labor, of tireless energy, of obstacles overcome and disappointments grimly accepted, there came a break in the sky. Recognition came from all directions, meager perhaps in financial return, but rich in the assurance that the publication was filling a need and that every number was better than the preceding one. Schoolmen began to say, "Why did not someone think of this before?"

Success Came Slowly

The future of the publication was assured. If the publisher would continue to improve his journal in typographical appearance and in the subject matter presented, hold to high standards of honor and efficiency, his publication would become a wholesome influence in the field of school administration. In fact, with a reasonably widened reading constituency and such broadened and useful service as the publication could render to that constituency, it would become a good influence in the educational life of the nation.

These aims and aspirations have in a measure been realized. When the labors of a quarter of a century have been weighed and measured, it will develop that they constitute a modest contribution to the educational progress of the country. They have helped to promote greater efficiency and higher standards in school administrative effort.

In the conduct of the JOURNAL some very definite policies and principles have guided the editor and his coworkers. These have been based in part upon definite ideas of the true functions and relations of school-board members and professional officers, and in part upon the conviction that no interest of any portion of the school government, or even self-interest, should interfere with the ultimate purpose of the school — the education of the child. It has been sought to promote progress by recording the doings of progressive school boards, superintendents, and school architects. In general, criticism has been withheld except in cases where a constructive



THE MODERN ROMAN SENATE "COMMITTEE OF FIFTEEN"
Marcus Antonius (School Board): "Oh, pardon me, thou patient prey of ambitious men, that I am meek and gentle with these butchers."—Julius Caesar, Act III, Scene I.
This cartoon, published in 1895, reflected the current opinion on the report of the "Committee of Fifteen" submitted at the meeting of Superintendents, held at Cleveland. The report proposed that the school boards in cities be reduced to a "bureau of clerks" and the superintendents elevated to power, to have authority to employ and dismiss teachers, adopt textbooks, etc.

reform could be hoped for. To attack measure, not men, has been the invariable rule.

Some Policies

From the very first issue the JOURNAL has sought to reflect the best thought with respect to the organization of school boards and to argue for the freedom of the schools from the domination of city councils, and in general, from the control of any political or partisan interests. It did not take many years of experience to form the very definite conclusion based upon observation of the conditions in many cities, that the large school board is a positive detriment to the efficiency of the lay and professional control of the school. A very positive stand was taken for many years against large school boards, although this had a direct effect of reducing the total possible number of subscribers, and, in a measure, actually reducing the patronage of the JOURNAL.

For increasing the efficiency of individual school-board members, much attention and space has been given to arguing for the reading of good literature, for the intensive study of school problems on the part of individual school-board members, for national, state, and county school-board conventions. In all this work, the proper perspective was kept, in that it was advocated that school-board members take up these problems from the layman's point, as citizens and parents.

In seeking to assist in the better understanding of the relations of school-board members to the professional heads of the schools, it was very early in its career the policy of the JOURNAL to advocate for the superintendent, the initiative in all strictly educational matters as well as in all matters of business which might have a direct influence upon the work of the classroom. At the same time, consistent propaganda was made for the right of the school-board member to review and to accept or reject the recommendations of the superintendent insofar as the judgment of the members of the board reflected local sentiment and community desires. It has not appeared that this position was wrong, even though it has been argued that the superintendent should be absolutely free in all matters.

The Physical Necessities Promoted

Among the chief functions of school boards, as it has appeared to the Editor, has been the duty of providing the physical necessities of the school in the shape of buildings which are safe and sanitary and fully adequate for the educational work which is to be carried on in them. With this in mind, a department devoted to school architecture has been exceedingly prominent in every issue of the JOURNAL. In this department, by means of illustrations and text, consistent pleas have been made for better design, for fireproofing, for the decoration of buildings and grounds, for better heating and ventilation, for adequate natural and artificial lighting, for better plumbing devices, etc. In arguing for the better equipment of school buildings, the problem of prison-made furniture was taken up in the late nineties. The necessity of adjustable furniture was argued for many years. In general, a consistent plea has been made for the best in equipment, apparatus, and supplies.

The health movement in the schools has been particularly emphasized in the JOURNAL. The danger of crayon adulterations; the criminality of the common drinking cup; the elimination of dust by hygienic oil brushes, and later by stationary vacuum-cleaning system, have been strongly emphasized from time to time. Not a little attention has been paid to the desirability of sanitary drinking fountains and damp-cloth dusters.

In promoting the idea of better teaching materials, the JOURNAL has constantly sought for the adoption of better textbooks and has consistently opposed unwise state uniformity of textbooks and state publication of books.

School Business Management

It has been the conviction of the Editor that much of the efficiency of school systems depends upon good business methods, as well as upon high educational ideals and correct pedagogical methods. It has been constantly a policy to promote the better conduct of school-board business, to stimulate interest in better buying methods, to argue the necessity of scientific budgets, of better school records of accounting based upon the best corporation and public accounting methods.

Among the many minor problems in school affairs which the JOURNAL has touched upon, may be mentioned school exhibitions in state and international expositions, the elimination of high-school fraternities, the promotion of simple graduation exercises, interest in the National Education Association, and in the Department of Superintendence, etc.

The SCHOOL BOARD JOURNAL did much to popularize attendance at the annual meetings of the Department of Superintendence. It urged upon boards of education to send their superintendents to these great gatherings.

It has been a constant aim to bring closer together in the spirit of coöperation, the teachers, superintendents, and school-board members, in the firm conviction that the ultimate ends of the school can be best achieved when there is complete harmony. It has been felt that whatever might promote the well-being and the contentment of the teaching force would directly improve the quality of the school's product. For this reason the JOURNAL has constantly advocated better salaries for teachers, pensions, permanent tenure of office, and participation of the teachers in the administration of the school systems.

And what, in the last analysis, does this all mean? Does it mean better buildings, higher-priced teachers, and better equipment for the sake of buildings, teachers, and equipment? Yes. But it also means a greater service to the cause of popular education. It means a tremendous impulse to the well-being of that one object for whom school boards, schoolhouses, teachers, books, and supplies exist — the pupil. It involves the future of the boy and girl of today — the man and woman of tomorrow — the future citizenship of the great Republic.

In passing its fortieth milestone, the SCHOOL BOARD JOURNAL not only points with a pardonable pride to its humble beginning, to the services it has sought to render to the cause of popular education, and to its present prestige and power, but it also pledges itself to renewed energy and increased service in the mission it has chosen for itself.


THE AMERICAN
School Board Journal
Devoted to School Boards, School Officials, and Teachers
Vol. 1. No. 1 CHICAGO AND MILWAUKEE, MARCH 1891 PRICE, TWENTY CENTS.

SECRETARY BARRON.

SCHOOL BOARD SECRETARY BARRON

THE SCHOOL, ITS SANITARY REQUIREMENTS.

FIRST PAGE OF THE FIRST ISSUE OF THE "JOURNAL"

Public-School Business Administration in the Past Forty Years

George F. Womrath, Business Superintendent, Board of Education, Minneapolis, Minnesota

For 250 years prior to 1890 the public-school system of this country had been passing through the development throes of administration organization. During the past decade of the nineteenth century, the three types of organization now in general use had emerged and had become quite universally adopted, namely, the unit type, the dual type, and the multiple type.

"The unit type of organization is that type in which the board of education employs an executive (superintendent of schools) who supervises the affairs of both the business and the educational departments and in which the business affairs are administered by one or more business executives.

"The dual type of organization is that type in which all of the business affairs are administered by one business executive who is coördinate with the superintendent of schools.

"The multiple type of organization is that type in which the business affairs are administered by two or more business executives who are coördinate with the superintendent of schools."[1]

These three types of school organization have persisted and remain, for the most part, intact, although the past decade of the nineteeth century and the first of the twentieth are conspicuous for the many refinements that took place in each type in an effort to produce better and more efficient educational results.

It is not difficult, in reviewing the history of the development and evolution of the administrative organization of the public-school system, to reach the conclusion that the first executive officer vested with individual authority was one whose duties were more closely identified with business administration than they were with instructional administration. The instructional executive, or modern superintendent of schools, did not enter the picture until a century and a half later.

At first the communities as a whole administered the schools. Then administrative boards, made up mostly of scholars and acting as committees of the whole, were elected by the communities to replace the attenuated action of the communities. As educational procedure expanded and became more and more complex, the qualifications for board members began to change and we find the members of school boards being chosen for their business ability rather than their scholarly attainments, and the boards following business-organization trends, dividing themselves into committees through which to administer the various school activities.

Principles of Centralized Authority

These committees soon recognized the soundness of the principle of centralized responsibility and began to appoint individuals as secretaries and clerks to perform the purely business acts of the committees. At first these acts were confined to the making out of payrolls, purchasing of books, supplies and equipment, and the maintenance of buildings. The committee still reserved the responsibility for the direct administration of all instructional activities.

As the instructional side of the school program assumed its proper weight in the thought of the people, the communities and the board members themselves saw the conflict that was looming between the physical or business side of education and the instructional side, and before long the appointment of superintendents of education began to be made. The first of these appointments was the superintendent of schools in Buffalo, N. Y., in 1837.

[1]Amos L. Heer, *The Present Status of Business Executives in the Public Schools of the United States in Cities of 25,000 and More Inhabitants.* Published by the author. Kent State Normal School, Kent, Ohio.

For many years the Minneapolis school system has exemplified in an outstanding way correct principles of administration as applied to school-business affairs. The results, which are largely due to the writer of the present article, are outstanding evidence that correct principles applied with wisdom and intelligence contribute enormously to the efficiency of a city school system. — The Editor.

Cubberley says: "Some of the first superintendents of city school systems were not even schoolmen, and their duties were more those of a school-board clerk or business manager of today than those of a modern professional superintendent."[2]

The exceedingly simple programs of the earlier schools could easily be handled directly by school boards comprised of reasonably intelligent men. As the programs expanded and the activities became more complex and the work of administration more arduous and complicated, involved educational, instructional, business, architectural, engineering, and accounting problems presented themselves. As these problems became pressing, the school boards found it more and more necessary to delegate the professional aspects of school administration to trained individual experts, many of whom were not connected with the school system. Thus it was that, because the school boards in general still clung to the idea that they should directly administer the schools, there grew up a hydra-headed organization of coördinate executives.

For the most part, these executives were not educators, and while their administration of the physical plant functioned efficiently and economically, from a purely dollars-and-cents standpoint, care was not always taken that the business activities were made subservient to the instructional activities. Just to make a record, the business executives only too often endeavored to effect economies at the expense of instructional efficiency. "It is at this point that some of our business managers in the past have made trouble. A few, here and there, have acted almost as though they thought that the balance of the school system existed to afford business for their office to handle, and they have made their office, instead of that of the superintendent of schools, the central feature in the school system. The superintendent, principals, and teachers have had to consider the business office first and the superintendent's office afterward, and in matters over which the business office ought to have little or no control."[3]

Business Side Emphasized

From 1900 to 1910 the field of business administration developed rapidly, and to many observers it seemed that the business aspects of the school organization were being overemphasized. Retrospection, however, clearly indicates that during this period the aggressiveness on the part of those who were primarily associated with the business side of school administration, especially accountants, architects, and engineers, was accentuated in an effort to develop and keep the school business departments abreast with the rapid strides which were being made throughout the nation in the fields of accountancy, building construction, and engineering.

[2] [3]Ellwood P. Cubberley, *Public School Administration*, (Boston).

Ward G. Reeder, *The Business Administration of a School System*, (New York).

Harry P. Smith, *Business Administration of Public Schools*, (Yonkers, N. Y.).

Building design was passing through a rapid succession of developments. Concrete construction was being introduced. Public schools were being made the laboratories for much experimentation relating to sanitation, ventilation, lighting, and many other scientific theories connected with the proper housing of school children.

During this period, vigorous school business executives, architects, engineers, and others with vision, courage, progressiveness, and ideals, did not wait for theory to keep pace with practice but went ahead with their studies, many of which directly and vitally affected school educational administration. Undoubtedly many of these executives, in their enthusiasm went far beyond their legitimate functions, and their aggressiveness often led them to encroach upon the prerogatives of the instructional executives. They kept the wheels of progress in school administration whirling at a rapid rate. Without them, the phenomenal progress made in school business administration during the past 40 years would not stand out in such striking contrast with that made during the previous two and one-half centuries.

Public education is a big business; one of the biggest and most important businesses on earth. Sooner or later it will have to be organized and conducted on a sound business basis. Sound business organization does not tolerate the subdivision of its general management among a number of coördinate executives. Its board of directors places entire confidence and responsibility in one general manager, under whom are divisional executives with coördinate responsibility. This same type of organization should motivate the public-school system, and ultimately will.

In industry, the sales manager, the production manager, and other divisional executives in coördinate positions, are held responsible to one general manager. In banking, there may be a number of vice-presidents and cashiers in coördinate positions, but there is only one president to whom they all are responsible.

Exacting Direct Responsibility

The same principle of direct responsibility should be applied to the school business, namely, that the person responsible for the quality and cost of the product and service should also be made responsible for the complete organization and machinery through which the quality and cost of the product and service are determined.

For the past 40 years there has been much theorizing about school-administrative organization. Although the paramount purpose of the public schools, as existing solely for the education of the youth of the nation, has long since been accepted and admitted as fundamental, and that all other school activities should be subordinated to this purpose, and while it is still tacitly recognized that "a house divided against itself cannot stand," yet the subdivision of educational activities between a number of executives of coördinate responsibility, on the theory of "suffer it to be now," will have to prevail until educational leaders can be developed who are capable of heading-up the entire field of public-school administration, both instructional and business.

While nominally the head of the school system, the superintendent of schools is seldom sufficiently trained in business procedures to assume the full responsibility of the position. The business executive is, therefore, only too frequently still called upon to render educational decisions and take educational steps in connection with instructional programs which

primarily are not within his province. To illustrate: One of the most important procedures in connection with school administration is the preparation of educational specifications for new schoolhouses. To prepare such specifications requires an intimate knowledge of every phase of both instructional and business administration, and involves a prerogative for which the superintendent of schools should be held solely responsible. In practice, the business executive, in nine instances out of ten, is called upon to prepare these specifications. He goes ahead and does so, and thereby assumes responsibilities which do not belong to him. The school system makes progress, but not according to proper procedure. So while it is highly commendable to theorize and dream dreams, we should not be impatient with the business executives who have gone beyond the boundary of their proper sphere of action, nor minimize the inestimable debt the educational world owes to these business executives, architects, engineers, and others whose studies in many fields of school administration, both instructional and business, have played a large part in the wonderful progress that has been made in recent years in efficient school administration. (Concluded on Page 118)

Forty Years' Progress in School Administration

D. D. Hammelbaugh, Secretary, Board of Education, Harrisburg, Pennsylvania

NOTE. Among the secretaries of boards of education in the United States there is none that has to his credit a more splendid record than has Secretary Hammelbaugh. His experience covering a half century, his contributions to the gatherings devoted to secretarial service, and his thorough grasp of the scope and function of the board of education enables him to write intelligently on the progress during the past 40 years. — The Editor.

You have invited me to give my impressions of the improvement in school business administration during the past forty years. I believe I can best show such improvement by using my own school district, that of the city of Harrisburg, Pennsylvania, as the illustration.

In September, 1883, when I entered the employ of the Harrisburg School District, a member of the board was also the secretary of the board, and devoted but a small portion of his time to the work. I was the only other business employee of the district, served both the secretary and the district superintendent of schools, and, even so, had not enough work to occupy my full time.

In 1885, a full-time secretary of the board was elected, and since that time, the secretary of the Harrisburg School District has not been a member of the board of directors of the district. In July, 1895, I was promoted to the position of secretary. My work, at first, consisted of little more than the writing and keeping of the minutes of the board and the issuing of warrants for the payment of teachers and for repairs and supplies. Seven years later, in 1902, a second clerk was added to the force. In the meantime, the district had increased in size, and the supplying of textbooks and supplies had been added to the duties of the business office. In 1907, a young woman stenographer was added to the business force who worked for both the secretary and the district superintendent of schools.

Up until this time, the board of directors of the school district of the city of Harrisburg consisted of 32 members. In 1911, when the new school code of Pennsylvania was adopted, changing the membership of the board from 32 to 11 directors, a reorganization of the business methods of the board was necessary. Prior to 1911, most of the business of the district had been transacted by committees of the board of directors. After 1911, the work previously carried out by the committees was delegated to the executives.

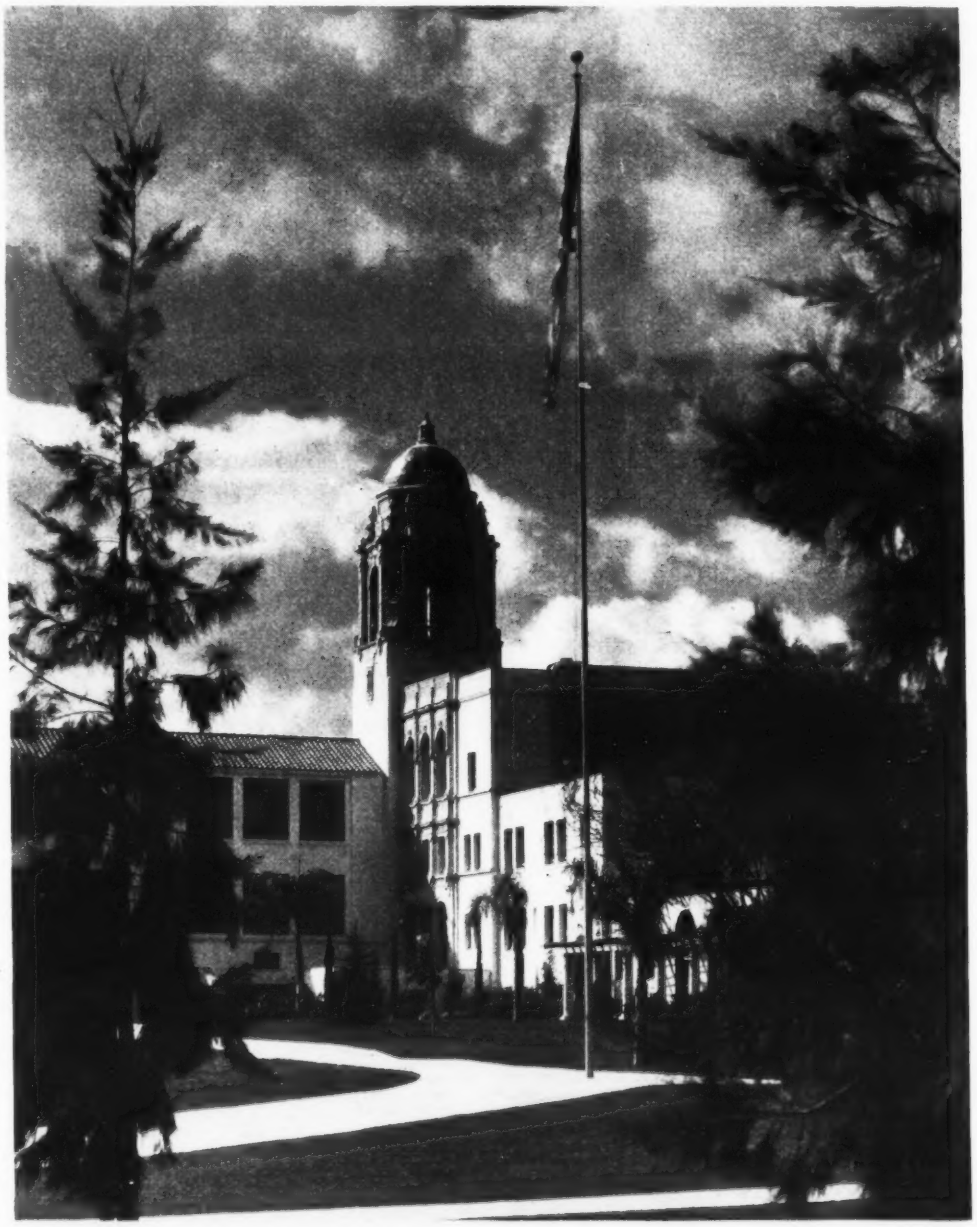
The directors began gradually to realize that the business department of the district was not operating in the most efficient manner, and that statistical information was not readily available, so, in 1917, a survey of the business department was ordered by the board and made by the Bureau of Municipal Research of New York City. This survey showed the directors that their officials were doing all that could be humanly expected of them, but that the department was greatly undermanned.

As a result of this survey, the business department was reorganized with the secretary as the executive head, having in his department a purchasing agent who prepares schedules and secures bids on all supplies and has charge of their purchase and distribution to the schools, a superintendent of grounds and buildings who has general oversight over the custodial force and all repairs and improvements, and an accountant who has charge of all financial accounts, an assistant to the secretary, and a stenographer.

This, in brief, has been the growth of the man power of the business department of the school district of the city of Harrisburg. Its growth in importance and duties has been just as great. Today, the secretary is the executive head of all the financial affairs of the district. However, sight has not been lost of the fact that the business department exists only because it is needed to further the work of the educational department, and there has always been the fullest coöperation between the two.

With the growth in school systems throughout the country during the past fifteen or twenty years, there has naturally been a tremendous demand on the business administration of the systems, and this could be met only by an enlargement of the force handling the work and by the employment of persons trained for the service.

Today, there is just as much need for trained men in the business administration of the schools as in the educational administration. By this I do not mean that this work should be taken over by the educational administration, but that the business administrator should be trained for his work, and that this training should enable him to coördinate his work with that of the educational department, and, at all times, to promote the work of the educational department by the efficient manner in which his own department operates.



The new dignity and the importance of the school in the community is illustrated in no more tangible manner than in the beautiful school buildings placed in beautifully kept grounds, which are to be found in practically every city, large and small, from the Atlantic to the Pacific Coast. The El Rodeo School at Beverly Hills, California, is typical of the practical, educationally useful, and beautiful buildings which are becoming common in every city and state.

Some Major Changes in College Administration During the Past Forty Years

Fred C. Ayer, Professor of Educational Administration, the University of Texas

In summarizing the changes which have occurred in college administration during the past forty years, the writer depended largely upon a number of studies recently made at the University of Texas.[1] The number of objective studies which bear upon college administration is small, and compared with treatments of public-school administration, the several studies of college administration are relatively meager in factual materials. It is possible, however, by combining the annual statistical data published by various agencies with the several first-class studies of certain special phases of university administration, to get a fairly adequate idea of the more prominent changes which have come about in the past twoscore of years. Despite the traditional tendency of higher education to resist change and to hold to old standards, there is ample testimony to indicate that many important changes have occurred in the past four decades. The more objective features of these changes will be treated briefly in the lines to follow.

A number of the most outstanding changes in college and university administration during the past forty years have come about as the result of changing concepts with reference to the general nature of the aims and agencies of higher education. Such, for example, are the new points of view which have led to the rapid growth of state-supported institutions, the increase in technical and professional training, the rise of the junior college, the increasing prestige of women as desirable college students, the spread of extension activities, and the striking increase in the number of students in attendance at higher educational institutions.

State-supported higher educational institutions were well established in 1891, but the sums granted by the states for financial support were meager, compared with the support which has been extended in recent years. With a few exceptions, the state universities in 1891 were small, struggling, unimportant institutions. The prestige of the state-supported school, be it cultural, social, or athletic, suffered greatly in comparison with that of the private college or university. This is reflected in the comparative enrollment of state and privately-supported colleges. Among the ten largest universities and colleges in 1891 — Michigan, Harvard, Northwestern, Columbia, Yale, Oberlin, University of Pennsylvania, Lake Forest, Cornell, and Illinois Wesleyan — there was only one state university, Michigan.

Note the change forty years later. Among the ten largest institutions in 1930 — California, Columbia, Illinois, Minnesota, New York, Ohio State, Michigan, Wisconsin, Harvard, and Washington — there are only three private colleges, Columbia, New York, and Harvard. Similar figures could be adduced to show like advances in financial support, buildings, and curricular offerings on the part of the state universities. The great period of state university expansion began about 1890. By 1910 President Pritchett said, "The rise of these great (state) universities is the most epoch-making feature of our American civilization," and then made the notable prediction which has since come literally true in many of the states, "They are to become more and more the leaders, the makers of our civilization."

Expansion of Professional Training

Coincident with the growth of state universities has been the rapid expansion of professional and technological training in both private and state colleges. The older schools of divinity, law, medicine, and engineering have been greatly expanded, while numerous new types of professional training have been organized as distinctive administrative units. These include schools of pharmacy, dentistry, mining, architecture, forestry, education, journalism, business administration, library training, and other important fields of human enterprise. Home economics, agriculture, physical training, the fine arts, and numerous other types of technical or technological training have risen to undreamed heights of academic prestige and scientific standing.

Another far-reaching movement in the reorganization of higher education involves the rise of the junior college. Koos[2] has described this movement in detail. Some of its implications will be considered later. It is sufficient here to note that the junior college as we now conceive it was unheard of in 1891. Koos estimated that in 1921, there were 207 junior colleges, with a total enrollment of 16,000 students. A *Directory of the Junior College,* prepared by Dook S. Campbell, secretary of the American Association of Junior Colleges, for January, 1931, lists 436 junior colleges with a total enrollment of 74,088 students. Junior colleges have appeared in every state but five in the Union.

The year 1891 was a notable milestone in the movement for coeducation, a movement which had already gained considerable headway. It was in this year that Brown, Tufts, and Yale began to admit women students for the first time on something of a parity with men. Standard colleges were commonly classified at that time as colleges for men and colleges for both sexes. Colleges for women, of which there were many, were usually classified and treated separately. In the standard group as a whole there were in 1891 about four times as many men as women in the collegiate departments; there were over ten times as many men as women in the graduate departments; and, most striking of all, there were 45 times as many men in the professional schools as there were women.

In 1930, the ratio of men to women in the five largest colleges in the United States — California, Columbia, Illinois, Minnesota, and New York University — was five to three in place of four to one, while the ratio of men to women receiving graduate degrees beyond the bachelor's was almost fifty-fifty instead of ten to one as formerly. Women have made notable, but less distinct, gains in registration in professional courses.

Development of Extension Work

One of the most aggressive changes in general administration of college work since 1891 is the expansion of its program to include extension activities. A report on University Extension[3] made in 1891 is limited almost exclusively to the mention of courses of lectures made by no more than one or two instructors per university. Several universities that year, notably the University of Wisconsin, announced their intention of organizing extension courses following the plan of leading English universities. These initial plans developed rapidly. The field has grown so since that time that it is difficult to make a short summary statement concerning it.

Extension work has become an integral part of university organization everywhere involving nearly all of its regular activities. It has gone into many new and comprehensive fields such as the organization of extension centers, the supervision of public-school debates and community dramas, library extension, visual education, radio, home reading, coöperation with parent-teacher associations, home demonstration, research work, and the preparation of bulletins. In the number of students reached, the size of its financial budget, and the scope of its work, extension has become one of the most important divisions of the modern university.

Possibly the most striking single index of general change in university administration during the past forty years is the increase in the size of the student body. Moseley[4] found that the median size of 26 leading universities in 1886 was 390 students; in 1906 the median enrollment of the same 26 was 1,400; and in 1926 the median was 5,000. The total increase in enrollment of the 26 colleges and universities during the period of forty years was 1,150 per cent. The publicly-controlled colleges increased about three times as rapidly in enrollment as the private colleges. In recent years large colleges have increased more rapidly than small colleges. Indeed, there has been a distinct tendency for the smallest colleges as such to disappear entirely either through growth, amalgamation, or total abandonment.

Administration Changes

The foregoing general changes in the development of higher education in the past forty years furnish the conditions which have led to numerous administrative changes in a more special character. Such, for example, are the changes in faculty organization, the growth of the summer school, development of new plans for the admission of students, changes in entrance and graduate requirements, and the expansion and modification of curricular offerings. It will be well to consider each of these in such detail as the brevity of time allotted to this subject permits.

There have been many changes in general control and faculty organization during the past forty years, but there is as yet no common theory of university administrative control similar to that which prevails in elementary and secondary education. College boards of education are as varied as ever in title, length of term, and function. The outstanding change in board organization has been the great increase in the number of board committees, a change which runs just counter to the prevailing tendency in the public schools to decrease the number of school-board committees.

Faculty organization, on the other hand, despite the great increase in various types of college training included, has shown many tendencies toward standardization of practice. For example in 1891, the terms "department," "college," and "school" might mean almost anything from a single course to the whole institution. These terms are fairly well, although not completely standardized at the present time. The same type of standardization has occurred in connection with professional rankings, teaching loads, and salary schedules, although there is considerable progress still to be made. Take, for example, the meanings of the titles "Dean," and "Director."

There has been a tendency to draw sharper lines of cleavage between the different levels of higher education. This has been most strikingly evident in the cleavage between the sophomore and junior years as manifest in the organization of the upper and lower division of junior and senior colleges, and in the growing practice of

[1] See later references.

[2] Koos, L. V., *The Junior College Movement,* Ginn and Company, 1925.

[3] Report of the Commissioner of Education, 1890–1891. Vol. 2, pp. 843–850.

[4] Moseley, Joel Nathaniel, *Major Factors and Features of College Administration as Revealed by a Study of College Catalogues for the Years 1886, 1906, and 1926.* Ph.D. Thesis, University of Texas, 1930.

deferring specialization to the junior and senior years.[5] In this connection the majority of colleges have set up some sort of a "major" system which has tended to push the so-called "liberalizing" courses into the freshman and sophomore years and emphasize specialization and "occupationalization" in the more advanced college and university years.

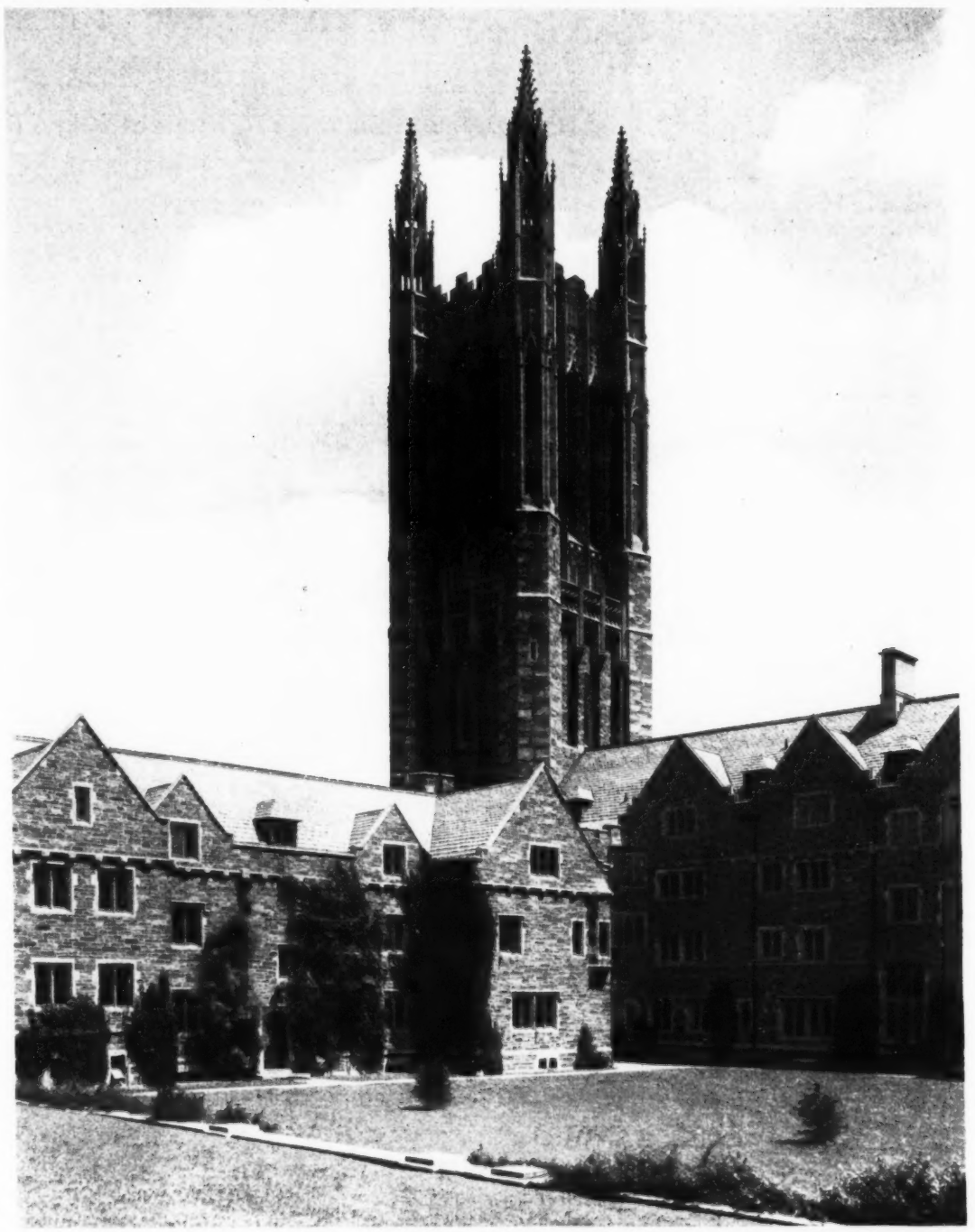
The growth of the summer school marks one of the most significant changes that occurred in the administration of the college calendar during the past forty years. It is characteristic of the power of resistance to change on the part of college administration that there have been relatively few changes in the calendar program for the normal college year and that practically all of the marked changes which have developed have been directly associated with or initiated by a totally new feature of the calendar, namely, the summer term.

The month of September still marks the opening of the regular college year and the month of June the time of closing. The length of annual term is distributed now as it was forty years ago somewhere between 34 and 39 weeks, the semester plan has gained only a little on the quarter plan, and the great majority of colleges still teach on a 5-day-a-week rather than a 6-day-a-week schedule.

In opposition to the stability of practices maintained during the regular college school year, the holiday and vacation periods have shifted considerably, the Easter and Thanksgiving vacations being the chief gainers, and the summer vacation the chief loser from the holiday point of view. None of the colleges reported by Moseley administered summer schools in 1886. The report of the Federal Commissioner of Education in 1891 shows that in a number of colleges summer courses were given by professors in charge, but not under the jurisdiction of the college.

Increasing numbers of students, particularly teachers, began to take advantage of the summer courses. They became so popular that Harvard University decided to bring them under university control and in 1891 authorized the granting of credit toward a bachelor's degree for seven courses given in summer school. There were 287 students in the Harvard summer courses in 1891. The University of Indiana organized a university summer school in 1890 with 31 students. Altogether there were then about two dozen colleges in the United States offering some type of summer-school instruction.

From these weak beginnings the summer-school movement has grown until now all of our state-supported colleges and over two thirds of the private colleges in the United States have elaborately organized programs of summer-school instruction. Summer-school work in practically all of these schools may be counted on regular academic degrees; in a considerable number the summer quarter is organized as one of the four regular quarters; and in not a few the summer courses, particularly in graduate work, are more extensively offered and attended than during the regular year.



The growth of the American college during the past 40 years is evidenced not only in increased enrollment of students, but also in magnificent new buildings. The Graduate School of Princeton University is just one of numerous efficient and beautiful college buildings which are found scattered all over the United States. (Galloway Photo.)

Modifications in College Admissions

One of the most important changes in college administration during the past forty years is the modification in plans by which students are admitted to college. Practically all students were admitted by examination in 1891. A few state universities were admitting students on the basis of high-school certificates. Today there are at least seven ways widely used in practice by which students are admitted into college[6]:

1. By examination of the applicant in all specified subjects at the college or university.
2. By presentation of certificate (transcript) from an affiliated secondary school.
3. By examination in all specified subjects under the direction of a separate board, such as the college-entrance examination board or the regents of the State of New York.
4. By a combination of the examination and the certificate methods.
5. Presentation of a diploma from an approved high school.
6. Certificate from an approved high school, psychological examination, and a thorough history of the applicant.
7. On the basis of maturity, vocational experience, and psychological examination.

Entrance Requirements

Important changes have also occurred in the college entrance requirements since 1891.[7] At that time practically all entrance requirements were stated in terms of subjects and books.[8] The advent of the Carnegie unit which defines high-school and college work in quantitative terms based on a total standard year's work, marks in itself a distinct advance in the administration of credits.

Two somewhat contradictory tendencies have characterized the changes which have occurred in entrance requirements. The one has tended to raise the general level of the type of subject matter required; the other has tended to liberalize the specific subjects required. In connection with the first tendency, arithmetic, grammar, and geography have been supplanted as entrance requirements by more advanced subjects, and the English prescriptions have risen from about a junior-high-school level to three years of English which compares very favorably with the English formerly taught in college. So also has it been with mathematics, the natural, and the social sciences.

On the other hand, high-school graduates are given much greater freedom in the presentation of subject matter for college entrance. Foreign-language requirements, for example, have been reduced from one half of the old total to one fourth of the present total; modern languages may be substituted for ancient; and in approximately one half of the state universities may be waived entirely. This same freedom of choice is characteristic of the other high-school subjects. Indeed, a very considerable number of standard colleges will admit students graduated from any accredited high-school course which contains three units of English.

Probably the most fundamental change that has occurred in university administration may be found in the curriculum. This is manifest both in the subjects required for specific degrees and in the greatly increased variety of the types of college training offered. The common tech-

[5]Koos, L. V., *op. cit.*, pp. 77–92.
[6]Moseley, J. N., *op. cit.*, p. 170.
[7]*Department of Superintendence, Seventh Yearbook*, 1929, pp. 331–362.
[8]Nelson, Eastin, *Development of the Doctrine of Social Utilitarianism in American Education During the Past Half Century*. M.A. Thesis, University of Texas, 1929.

nical terms of the present day such as majors, semester hours, units, and credits were not used in the catalogs of the early 90's, but it is possible to compute graduation requirements from the lists of subjects which were then described in considerable detail. An excellent illustration may be found in the changes which have occurred in the requirements for the B.A. degree. Moseley[9] reports in his study that in 1886 nearly one half of the colleges prescribed as much as 75 per cent of the work for the B.A. degree and one sixth of them prescribed all of the work. By 1906 the median amount of prescribed work had been reduced from 89 to 32 semester hours, and by 1926 to 26 hours. Foreign language as a whole had been reduced from 40 to 10 hours; Greek and Latin from 32 to 0 hours; mathematics from 11 to 4 hours; English from 12 to 8; and science from 16 to 5. Only in social science had there been an increase in the median requirements for a B.A. degree and this was from 2 to 5 semester hours.

Freedom in Choice of Studies

The greatly increased freedom which the student is now allowed in his choice of studies is even more pronounced when the variety of degrees now offered in colleges and universities is considered. The extent to which the modern college has expanded its program was little dreamed of by college administrators forty years ago. If one counts all the varieties of bachelors', masters', and doctors' degrees offered in different college and university divisions, 26 colleges show an increase from 30 to 120 different kinds of degrees during this period. The total number of individual degrees granted to students by the same 26 institutions increased from 1,931 in 1886 to 16,080 in 1926. Among the more popular of the degrees recently introduced are Bachelor of Business Administration, Bachelor of Education, Bachelor of Journalism, Bachelor of Fine Arts, Bachelor of Music, and Bachelor of Architecture. Koos found that the number of professional schools in 18 large universities increased from 4.2 per university in 1895 to 7.3 in 1920.

In 1886, 20 per cent of all degrees given by the foregoing 26 institutions were doctors' degrees, but these were chiefly medical and dental. Only 2 per cent of these were Ph.D. degrees. The chief gainers in the field of doctorate degrees have been Doctor of Philosophy, Doctor of Jurisprudence, and Doctor of Public Health. There has been a considerable decrease in the relative number of honorary degrees granted by colleges. The number of Ph.D. degrees has increased 4,500 per cent; the number of masters' degrees, 960 per cent; and the number of bachelors' degrees, 925 per cent. During this same time the total number of students increased 1,150 per cent, and the faculty members 1,225 per cent.

The downward shift of the materials from the college curriculum to the high school which began earlier in the nineteenth century has continued. English, grammar, geography, and arithmetic, already out of the first-class college in 1891, have continued downward and finally found their place in the elementary school. Algebra, plane geometry, ancient history, French, German, English literature, physics, chemistry, and the biological sciences — all extended and enriched — now appear in the high school and to a considerable extent have left the college forever as beginning subjects.

Trend From Classical to Vocational

Finally, special mention should be made on the general tendency for college education to become more practical. The trend of modern education has been away from the classical and disciplinary concept of training and toward the occupational and special. There has been a general recognition of the rights of the individual to adapt his preparatory and college work to self-shaped and practical ends. With the great uplifting and enrichment of the high-school and junior-college courses which has come about in recent years, it is greatly to be doubted if the modern college is any less cultural or liberalizing than it ever was. The materials of professional and occupational training, moreover, are far from being devoid of cultural influence. Koos[10] and Hubbard[11] have shown that both men and women students now select college courses with definite occupational outcomes in view, and that the history of their subsequent occupational careers more than justifies this occupational emphasis.

This particular section and the paper as a whole may well be concluded by quoting from two of the studies which have contributed most to it.

"There is no escape from the inference that for this group of (mid-west) college graduates the occupational function of the major was the paramount one. This function appears both at the time of selecting it, and in the use made of it subsequently to the completion of the college course. Thus, the system which emerged from the curricular chaos of a quarter of a century ago is not merely a recognition of the need for specialization; to the student it is preëminently an opportunity for occupational specialization, or at least the beginning of such an opportunity. This occupational function is also in line with the greater maturity of college students in these later years, as compared with the students a century ago."[12]

"Two opposing forces have affected the administrative process connected with institutions of higher learning, the internal, which constantly tends to conservatism, and the external whose demands have been increasingly radical. In matters, such as the board of control, general administrative details, and the school calendar, in which the internal has prevailed, the changes which have taken place have been slight, and then forced by external pressure.

"The higher institutions of learning in the United States have, in the period studied, been subjected to changes more rapid than have ever before taken place in the history of higher education. Administrators have been forced to meet problems which shifted in nature and complexity before a solution could be reached. In the face of such conditions, many changes in the administration of such institutions have been made, but the number and extent of those changes have been materially reduced, and the process of reconstruction visibly restrained by the proverbially conservative attitude of those to whom the government of such institutions has been intrusted."[13]

[9] *Op. cit.*, pp. 148–170.

[10] *Op. cit.*, pp. 206–214.

[11] Hubbard, Louis Herman, *The Place of Vocational Training as an Objective of the Woman's College.* Ph.D. Thesis, University of Texas, 1929.

[12] Koos, L. V., *op. cit.*, p. 207.

[13] Moseley, J. N., op. cit., pp. 207, 208; 212.

Forty Years of Textbook Progress

O. J. Laylander, Chicago

I have before me four books: a facsimile of The New England Primer, Webster's Elementary Spelling Book ("old Blue-Back," 1857), Cyr's Primer (1891), and Pennell and Cusack's Primer (1930). These typical books mark definite steps of progress in the mechanical improvement of textbooks. It is a long step from the crude books of the first period to the works of art that are the current textbooks of 1930. In the preface to the revised edition of "old Blue-Back" we find the claim that one of the features of the book is "an improved form of type," and it was this type which with slight variations was generally used in the books prior to 1890.

While the books of that period were in striking contrast to the first crude attempts at textbook making, it is in the present period, commencing about 1890, that the most radical changes have occurred. These have been concurrent with the extensive investigations carried on by the various educational agencies in the leading institutions of learning. This research work has been directed chiefly toward the improvement of teaching in the elementary grades and is reflected in the character of the textbooks. Thus, optical hygiene, the study of eye movement, the length of line, the amount of interlineage, rhythm, uniform line beginnings, unbroken phrases, indicate the kind of activities which has placed the construction of textbooks on a truly scientific as well as an artistic basis.

The books of 1890 showed remarkable improvement in the type page, and yet, in this point alone, the greatest advance has been made in recent years. There is now a wider use of basal type with more strength or color. In the primers and readers of today there is being used increasingly a type especially designed by the largest type founder in the country for use in textbooks. The design of this type embodies the result of the studies of investigators here and abroad and its increasing use has contributed greatly to the legibility of the modern book.

The art quality of illustrations shows a distinct advance. The old-time drawings, lacking in perspective and delineation, have been displaced by well-drawn, simple, relevant illustrations, brilliant with artistic coloring. The development of the halftone processes, the availability of excellent photographs, the better use of color in maps, and numerous other factors have contributed to the remarkable degree of variety and style that makes the textbook of today a delight to the eye.

The durability of the textbooks of today also offers a striking contrast to that of the earlier books. The old board and leather covers went into discard. The paper found in the best textbooks today stands the wear and tear of use better than the papers of forty years ago. New developments in the binding process, the use of stronger materials, the substitution of stitching for sewing in certain kinds of books, the great variety of beautiful cover cloths that lend themselves to unique decoration, the discovery of cover material proof against bugs and water, are a few factors that make the modern textbook more usable and much more beautiful than its predecessors. The textbook of 1930 in its physical attributes would seem to have approximated perfection.

But it is not in mechanical excellence only that the modern textbook surpasses those of previous periods. There is another even more important factor, the content of the text. The day has passed when just anybody can write a textbook. The successful book of today is planned long in advance. Publishers vie with each other to secure the best possible authorship. Writers must be of recognized authority in their chosen fields. They must be in touch with the trend of requirements as reflected in the findings of the educational experts and the developments reached by professional research. Manuscripts must pass under the scrutiny of numerous competent critics and very often be subjected to the test of experimental use in the classroom before final acceptance for publication. The publishers must make sure that the content of the textbook will meet the generally accepted current educational requirements before he will proceed to put the book into appealing form.

The improvement in the character of books and the changes in methods of distribution have automatically worked changes in the methods of selling. Forty years ago it mattered not that the salesman knew little about his books. Even

the people who were to use the books had not yet learned to scrutinize the content. Adoptions often hinged chiefly on questions of personal prejudices or questionable practices. The successful agent was the smart agent — one who could turn to his own profit human weaknesses and ignorance, and the means used often bordered on the disgraceful.

Today the prime requisite for successful agency work is an intimate acquaintance with current educational trends and demands. The agent must know not only his own but competing books thoroughly. He must know more about his subject than his prospective purchasers and demonstrate his fitness to serve as a guide. To be a teacher of teachers it is almost imperative that he shall have had schoolroom experience. So, it has come to pass that, although forty years ago the school people looked askance at the book agent, today in the great majority of schools he is regarded as a valuable asset, an indispensable bearer of helpful messages.

The growth of free textbooks, the filing of prices in state departments of education, insuring against discrimination and disastrous price wars, the general practice of superintendents to consult with leading teachers, all have contributed toward raising the standard of salesmanship as well as the quality of the books used.

In the open field today the selling of textbooks has been shorn of all oldtime opprobrium. It is only in an occasional large unit where there is outside interference with school supervisors in the choosing of textbooks, or where the selecting board is unwisely constituted, that false issues are raised to befog the vision, or that politics takes precedence over the general good.

Forty Years of Textbook Making

By an Educational Publisher

It may be unhesitatingly asserted that no country in the world enjoys school textbooks more attractive, more utilitarian, and at a more reasonable cost, than those employed in the schools of the United States. The cause for this condition may be assigned, on the one hand, to the fact that the American schoolmaster demands good books, and on the other, to the readiness and ability of authors and publishers to supply that demand.

The enterprise, energy, and constructive ability which has characterized American industry, commerce, and finance has also found eloquent expression in the educational publishing field. The competitive attitude which publishers have maintained toward each other has meant better books and lower costs. Competent authorship has been located, the progress made in methods of teaching was observed, and the newer needs have been adequately met.

The modern school textbook is free from cumbersome and superfluous verbiage. It addresses itself directly and specifically to the study in hand. It is at once a compact, comprehensive, and complete document which serves its purpose most efficiently. It is an instrument which was constructed by a schoolmaster, to be used by a schoolmaster for one definite end — the instruction of the child.

Transition from Old to New Books

The past forty years of textbook making carries us back to that transition from Reed and Kellogg's Grammar, McGuffey's Readers, Ray's Arithmetics, and the "Blue-Back Speller." The present seems to see a fulfillment of the Biblical saying, "Of the making of books, there is no end." The memory of these old textbooks still lives, though many generations of people who actually studied them have long passed away.

During this period of transition from the old books to the new, there were many improvements in the printing, binding, and illustrating of schoolbooks. In the very old days, books were printed direct from type set by hand. Today, the linotype and monotype machines take care of the compositors' work, while the actual printing is done from plates, any number of which can be made from one set of dies. Before 1881, most illustrations were black and white. Within the past forty years, the perfection of four-color work produces illustrations almost with the exactness and fineness of tone of a water-color painting, so now we have printed reproductions of masterpieces of world-famous artists.

Much new machinery has entered into the binding process to displace hand labor. A modern bindery with up-to-date machinery may produce 20,000 to 60,000, 300-page sewed books, of octave size, per day.

On January 15, 1930, Commissioner of Education W. J. Cooper, made public a report by the chief of the division of statistics, United States department of education, that in 1928 there were sixty publishers of school and college textbooks. These figures are of sufficient interest to be repeated here.

The total net sales of sixty publishers amounted to $49,097,466 in 1927–28. The total number of books sold were 64,125,451.

	Books	*Sales*
Elementary-school purposes	39,406,677	$22,735,745
High-school purposes	18,638,290	16,288,422
College and university purposes	6,080,484	10,073,299

The total expenditures for public schools in 1928 was $2,174,996,959, exclusive of buildings and equipment. The amount spent for textbooks represents less than 2 per cent (1.63 per cent) of the total expenditures for public-school education in 1927 and 1928.

It will be seen from the foregoing that the progressive publisher of today is giving the schools better books, prepared by the best-trained educators, than was at all possible forty years ago. This causes us to wonder at times if the American people really appreciate this fact, that is, that of every hundred dollars spent for education, but two dollars of that sum is required to pay for all the necessary textbooks.

Newer Methods of Book Marketing

The methods employed in the selection and adoption of textbooks have undergone a radical change within the past forty years. This is largely due to the transition from old-time conceptions in school administration to the modern distinctions between the business and professional factors.

The day when the adoption of textbooks, the selection of teachers, and the formulation of a course of study, were approached in the nature of business transaction, has gone by. The choice of a textbook as to its merits and demerits has become a professional task. Greater care is taken today to establish the quality of a book and its adaptability for the purpose designed.

This change obviates the old-time rivalry which attended textbook contests when schoolboard members were intrusted with the responsibility of determining the choice of a schoolbook. Many of these contests were characterized by unpleasant situations and sometimes attended with scandal, bringing some of the best citizens into bad repute.

State Printing of Schoolbooks

Recent years have also clarified the question of the state printing of schoolbooks. Two states, California and Kansas, have made the experiment, and while the plan is at present intrenched in those states, behind political breastworks and defended on grounds of economy, it is, nevertheless, on the whole a decided failure.

Several states that were tempted to embark upon a similar scheme have, after exhaustive investigation, come to the conclusion that a political institution cannot successfully engage in the production of schoolbooks. Better schoolbooks, at a more reasonable cost, can be purchased in the open market. The findings made by several state commissions may be summarized in the following language:

1. There would probably not be any financial saving in cost of textbooks.
2. The selection of the best available texts would be seriously limited.
3. State publication would require uniformity of textbooks.
4. Long adoption periods with consequent obsolete and out-of-date textbooks result from state publication.
5. An inadequate supply of texts would probably result from state publication.
6. State publication has elsewhere sacrificed education to political expediency.
7. Other states have rejected the plan after careful investigation.
8. The two states which practice state publication are moving away from the plan.

Future of the Book Business

While the school textbook business, as exemplified in the United States, has many aspects which are assuring and gratifying, it also has a future for enlarged service.

The constant effort of educators to adjust the scheme of popular learning more nearly to the needs of a rising generation, also implies changes in the aids and agencies that enter into school life. A textbook is never quite modern unless it serves its purpose directly and adequately. The publisher must keep an eye on the movements and trends in the field of education and select his authors accordingly.

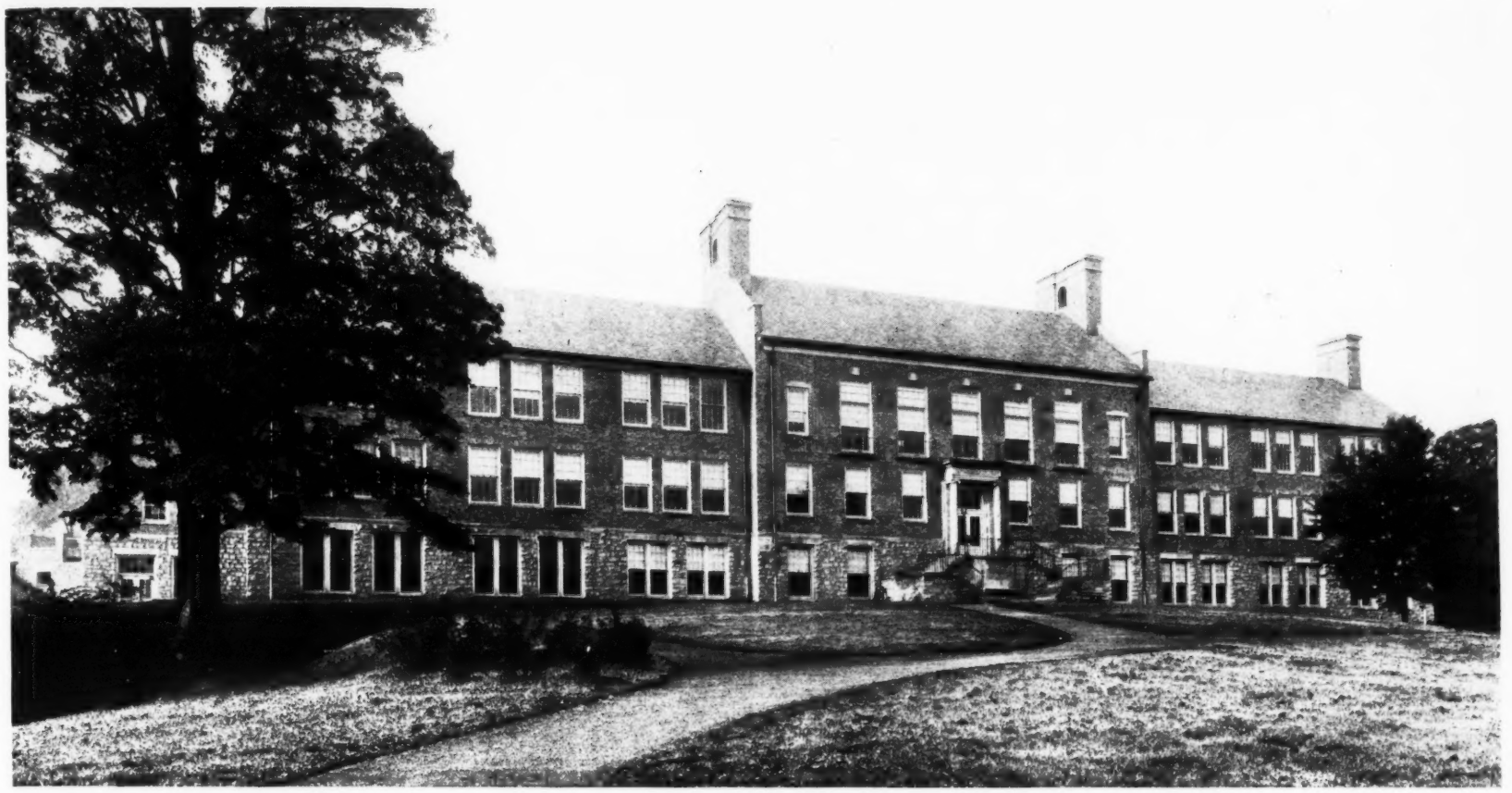
In recent years the educational publisher has availed himself more than ever before of the art of printing. While the everyday schoolbook, as far as its mechanical makeup is concerned, has aimed at durability it has also been a model in printing and binding.

Those who appreciate a well-planned, well-printed, and well-bound book have also noted the improvements made in recent years on the purely artistic side of book production. The selection of type faces is more carefully made. The designs which embellish the covers are neatly and tastefully drawn. The illustrations bear the touch of art in a greater degree than ever before.

The publisher, author, and artist, in order to continue with enthusiasm and with an ambition to produce a more attractive and utilitarian product, must have the coöperation and support of the school public. It is the encouragement thus far extended that has led to the excellence of the school textbooks which the country now enjoys. Likewise the future of the educational publishing business will depend upon the measure of recognition extended to meritorious and worth-while schoolbooks.

GREATNESS IN TEACHING

The teachers who have meant the most to us have been those who have been able to communicate their personalities to us; who have by personal contact and association within the classroom and without it been able to transmit to us a sense of appreciation of the beauties of life, something of the joys of achievement, and have excited us by Intellectual and spiritual intercourse to live intellectually and spiritually ourselves. May we all become such teachers. — B. F. Buck, Assistant Superintendent of Schools, Chicago.



FAIRMONT SENIOR HIGH SCHOOL, FAIRMONT, WEST VIRGINIA
The Warren S. Holmes Company, Architects, Lansing, Michigan

Forty Years in American School Architecture

William B. Ittner, F.A.I.A., LL.D., Schoolhouse Architect and Specialist, St. Louis, Missouri

About forty years ago Edmund T. Wheelright, as architect for the Boston schools, began to institute changes in schoolhouse design. Up to that time the dumb-bell plan and combustible construction were quite universal. Wheelright's principal contribution consisted of improving quality of construction and of putting some architecture into the building. The "closed" type of plan consisting generally of a central corridor with classrooms on both sides was left practically untouched.

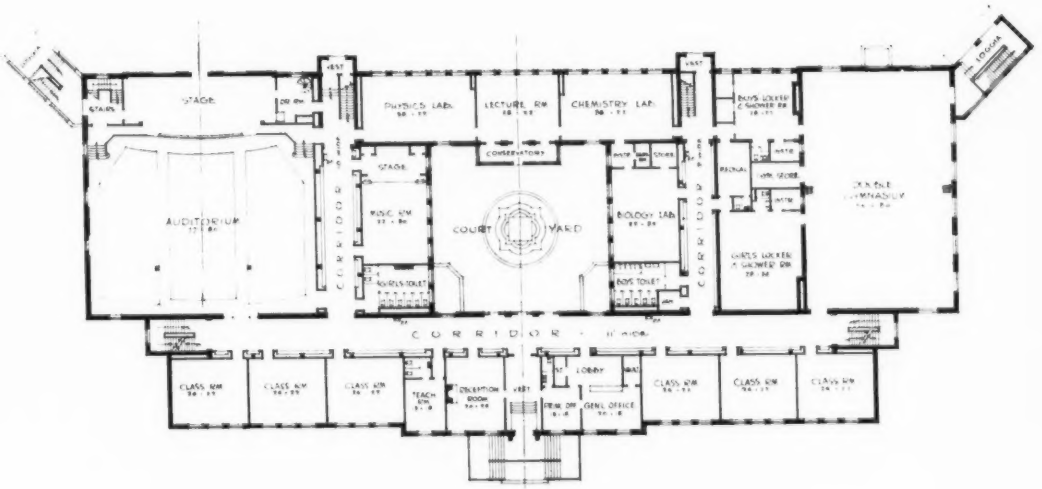
The fundamental change in schoolhouse planning was initiated about 1899 when the so-called "closed" plan gave way to the open and semiopen plans. The significance of this change will be appreciated when consideration is given to the fact that practically all important subsequent improvements in planning and construction, in lighting and ventilation, to say nothing of the improvements in design, may be traced directly or indirectly to this change. The enrichment of the educational program which came about gradually from this time on gave emphasis to the flexibility and possibilities of the open type of plan.

Decided Changes and Improvements

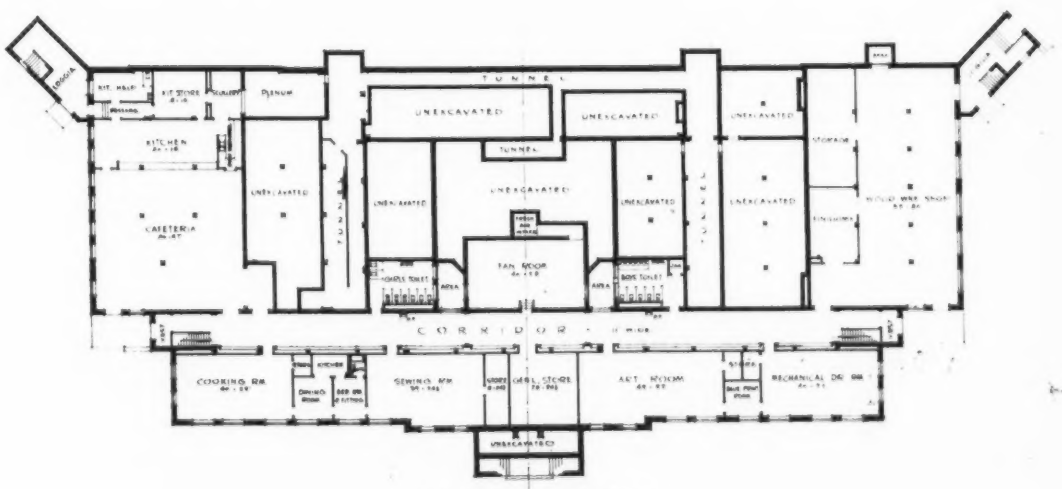
Among the many important changes and improvements that have come about during the past four decades are the following:

1. Larger, fewer, and better schools on larger, better-located, and more commanding sites. This fundamental change in building policy came as a result of increased educational requirements and the emphasis on health and playground activities. Incidentally these larger cities called for more skillful planning and engineering. In fact, the school became a specialized problem in the field of architecture.

2. The development of the work-study-play plan for elementary schools became an important factor to schoolhouse planning in that it forced definiteness in the educational requirements of schools. For this economy and efficiency administrative device, the country owes



FIRST FLOOR PLAN



GROUND FLOOR PLAN

FAIRMONT SENIOR HIGH SCHOOL, FAIRMONT, WEST VIRGINIA
Wm. B. Ittner, Architect, St. Louis, Missouri

LIBRARY, FAIRMONT SENIOR HIGH SCHOOL, FAIRMONT, WEST VIRGINIA

a debt of gratitude to Dr. William Wirt of Gary, Ind.

3. Marvelous changes in the field of structural engineering and building processes have affected schools the same as all other buildings. Fabricated steel and reinforced concrete have forced costs of fire-resistive construction down to the point where it has become wellnigh universal. A wealth of new building materials and new methods have been developed, many of which have weathered the tests and have been incorporated as aids to the safety, sanitation, economy, and beauty of schools. In the light of present-day invention and improvements, no building project is too vast, and none too intricate or difficult for the modern engineer.

Lighting, Heating, and Ventilation

4. *Lighting.* The open plan formed the initial step in the lighting improvement of schools. Bilateral lighting has been replaced by unilateral. The width of class- and study rooms has been adjusted, and window surface has been measured in proportion to room area for proper distribution. Improvements in type of windows, in quality and color of shades, in interior decoration, and in type and finish of equipment have all had a beneficent influence on daylight lighting.

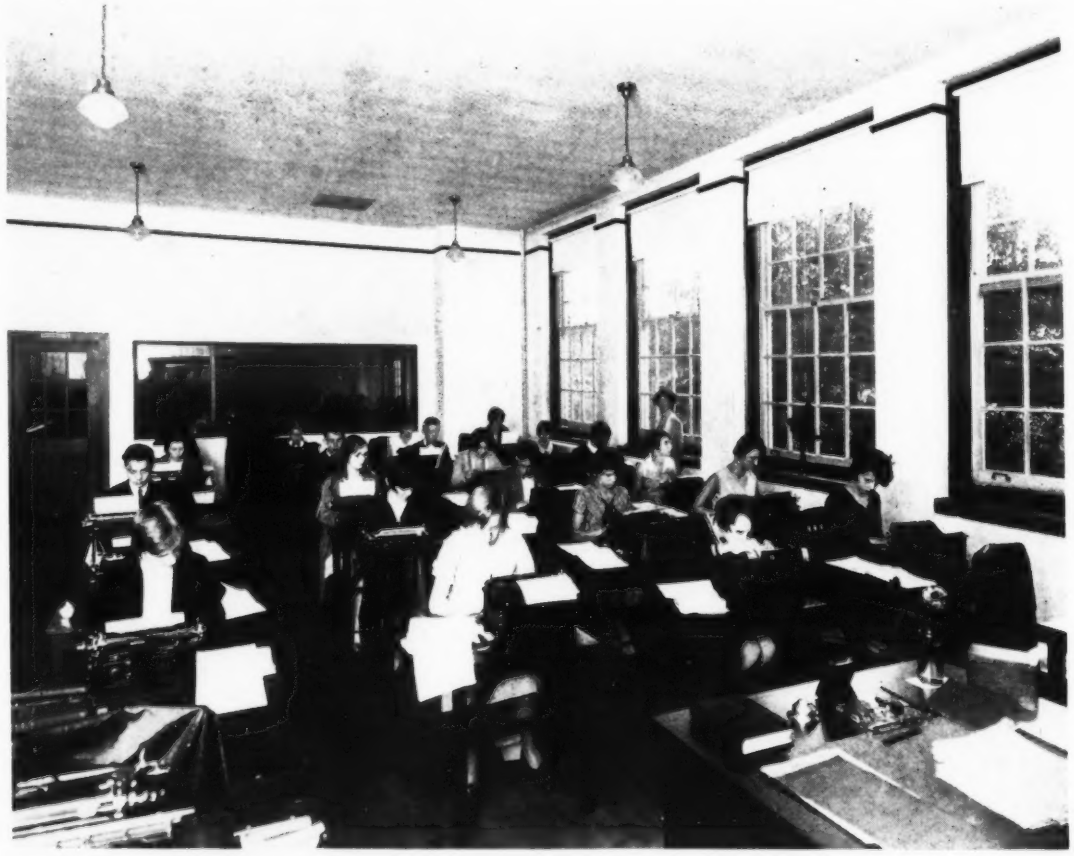
Artificial lighting has developed from nothing at all to any degree of illumination desired for building and grounds. Stage lighting control in our present-day high schools closely approximates that of the modern theater. A marked improvement in the design, quality, and appropriateness of lighting-fixture equipment for the diversified rooms of school have come in response to demands for more art in the details of school equipment

5. *Heating and Ventilation.* As in lighting, the opening up of the plan improved natural ventilation. Aided by equipment inventions from time to time, artificial ventilation has gone through various stages until at the present time any air condition desired is possible. Temperature, movement, and humidity can all be controlled.

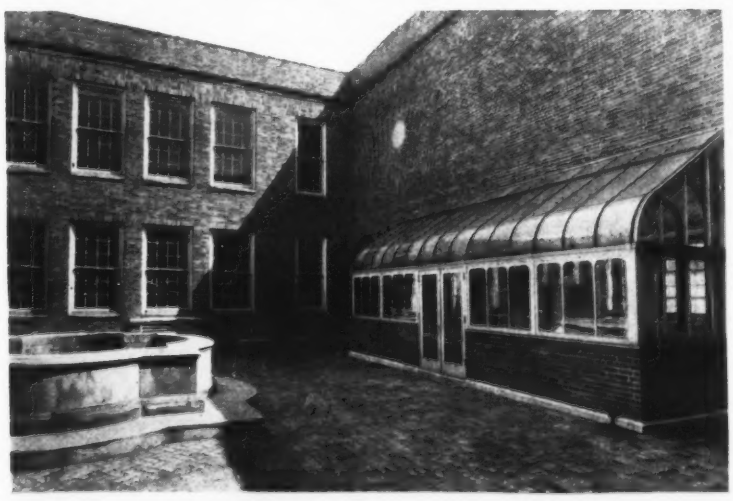
Grace and Beauty in Design

6. *Architecture.* The most noticeable expression of the progress in schoolhouse planning and construction is the development of a beautiful architecture. It may be noted by everybody. The opportunity for improved design accompanied the flexibility of the open type of plan. Mediocrity, monotony and hypocrisy (viz., cheap embellishments to cover up defects) have been disappearing with the limited closed-in plan of yesterday. In their place we have creative design, original treatment and adaptation of some of the finest architectural precedents.

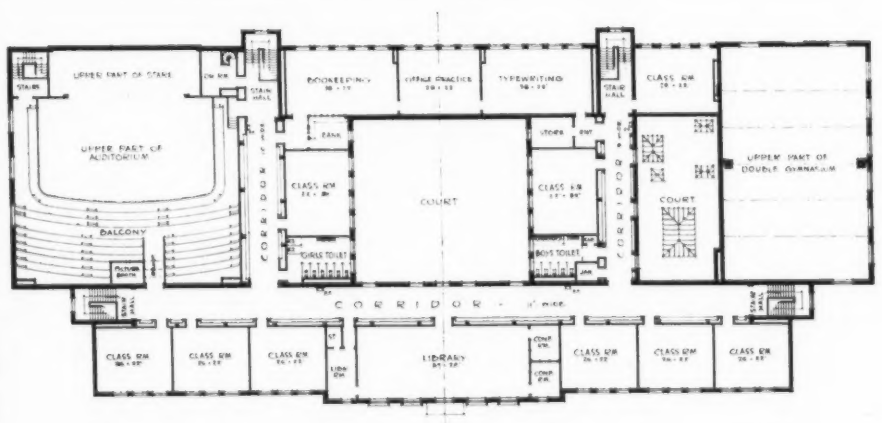
As is the plan so is the design. And today, every school-building project calls for an individualized plan. Despite an overabundance of rules, regulations, and codes, which in so many cases have added needlessly to costs and have



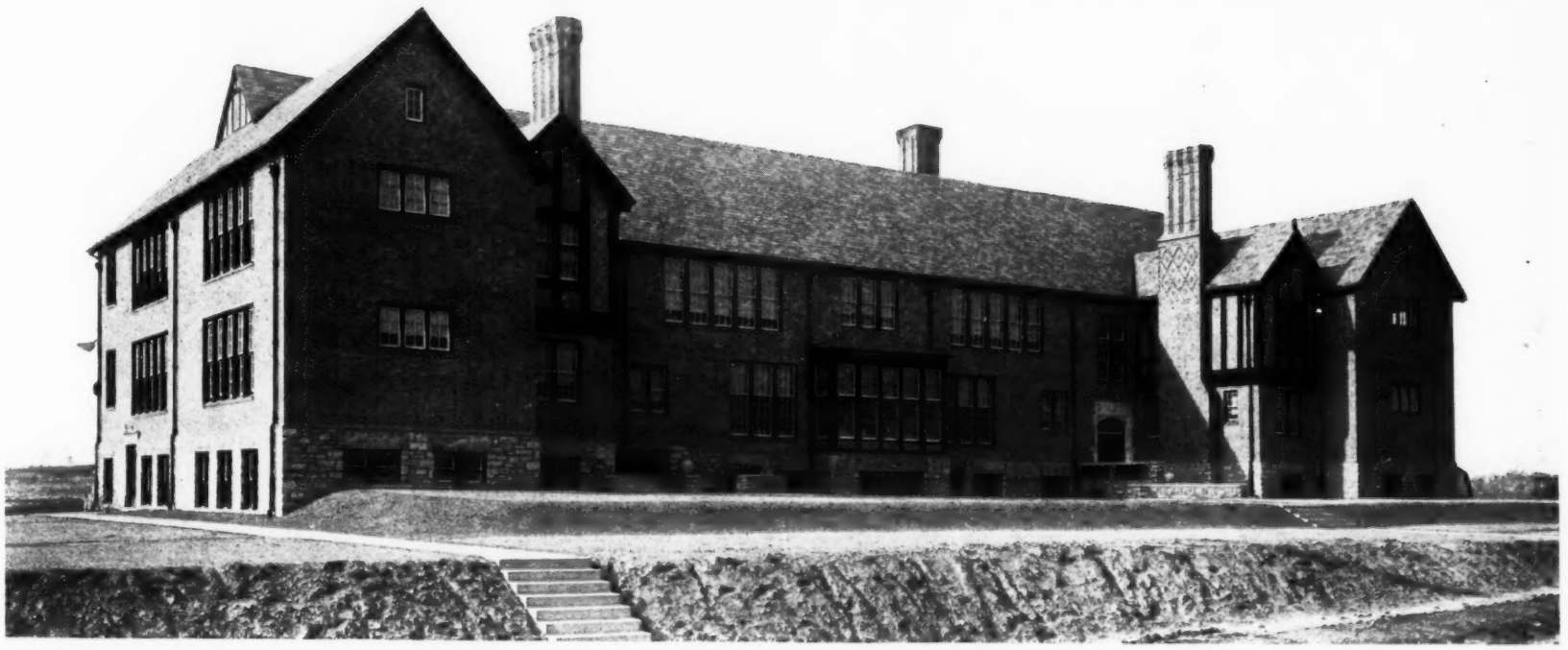
TYPEWRITING ROOM, FAIRMONT SENIOR HIGH SCHOOL



A SECTION OF THE LIGHT COURT, SHOWING CONSERVATORY



SECOND FLOOR PLAN
FAIRMONT SENIOR HIGH SCHOOL, FAIRMONT, WEST VIRGINIA
Wm. B. Ittner, Architect, St. Louis, Missouri



NATHANIEL HAWTHORNE SCHOOL, UNIVERSITY CITY, MISSOURI
Wm. B. Ittner, Architect, St. Louis, Missouri

militated against the free development of a plan, we have all over the country, school buildings that stand as admirable examples of thought, study, and creative talent, and either rank with the city's best architecture or may even be superior to it.

Thus we find school architecture today, in addition to its expressing the character of the school, fitting in with climatic conditions or with the traditions of a community. Color, proportion, handling of mass and detail have become interesting phases of school architecture. Attention to setting, to landscaping are receiving paramount attention. Nor is the exterior all. Color schemes for the diversified quarters of the planning of epuipment in harmony with the planning of equipment in the harmony with the building and its activities have become everyday problems.

THE NATHANIEL HAWTHORNE SCHOOL, UNIVERSITY CITY, MISSOURI

Wm. B. Ittner, F.A.I.A., Architect, St. Louis, Mo.

University City, the fifth city in size in Missouri, is one of the communities lying immediately west of St. Louis, which together with Clayton, Maplewood, and Normandy, completely prevents the further expansion of St. Louis except by mutual consent, and this seems a hopeless possibility as it has been repeatedly voted down when the question is put to the voters of the several communities. The combined population of these communities which are almost wholly residential, is about 200,000. The growth of the school population is, therefore, out of all proportion to the growth in assessed valuation. Schools must be erected piecemeal.

The problem in the Nathaniel Hawthorne School was to plan a school for 1,000 pupils, which, with a first unit comprising 11 rooms, could be expanded by easy stages to a building providing for the enriched facilities demanded by present-day schools.

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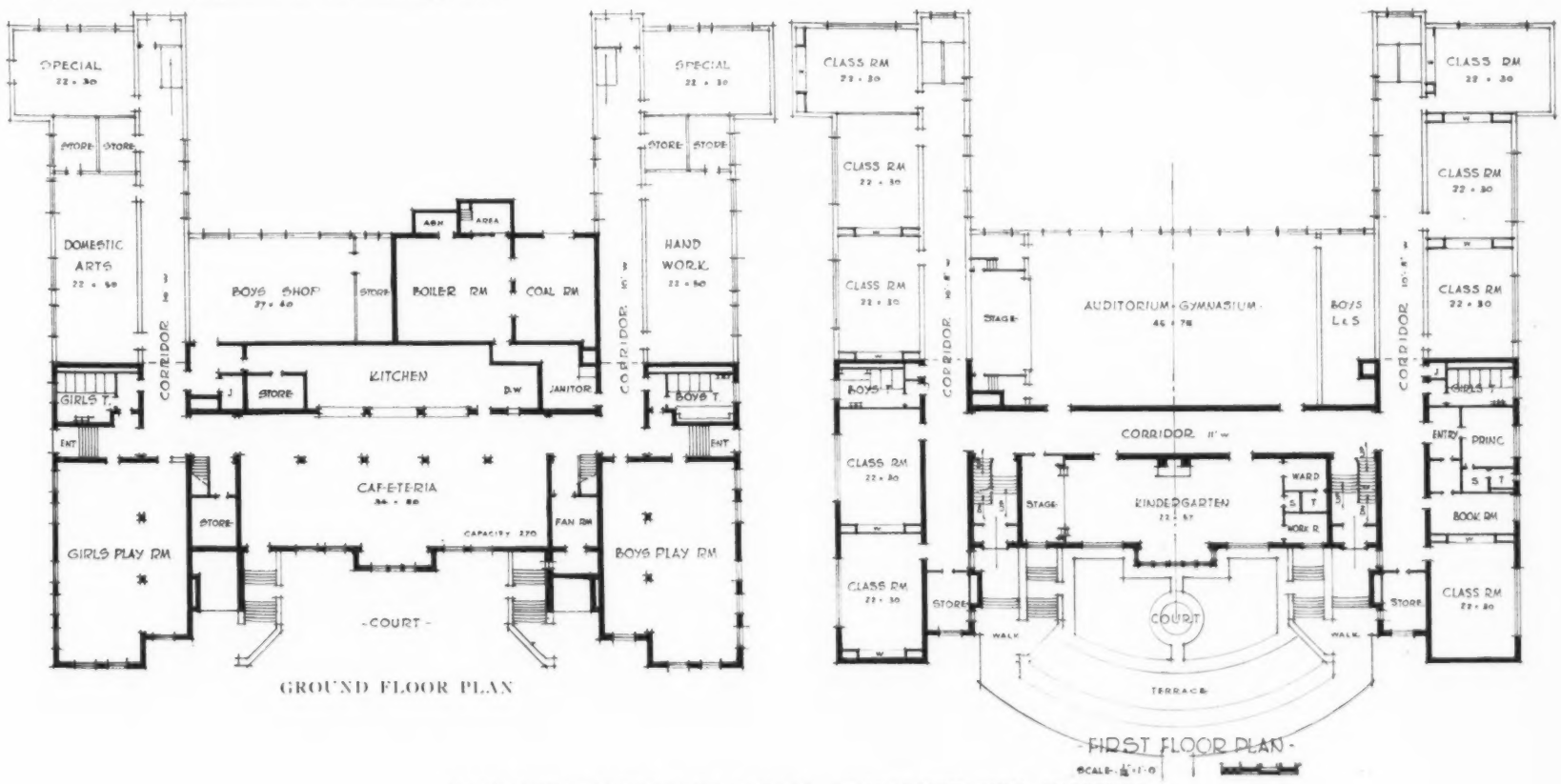
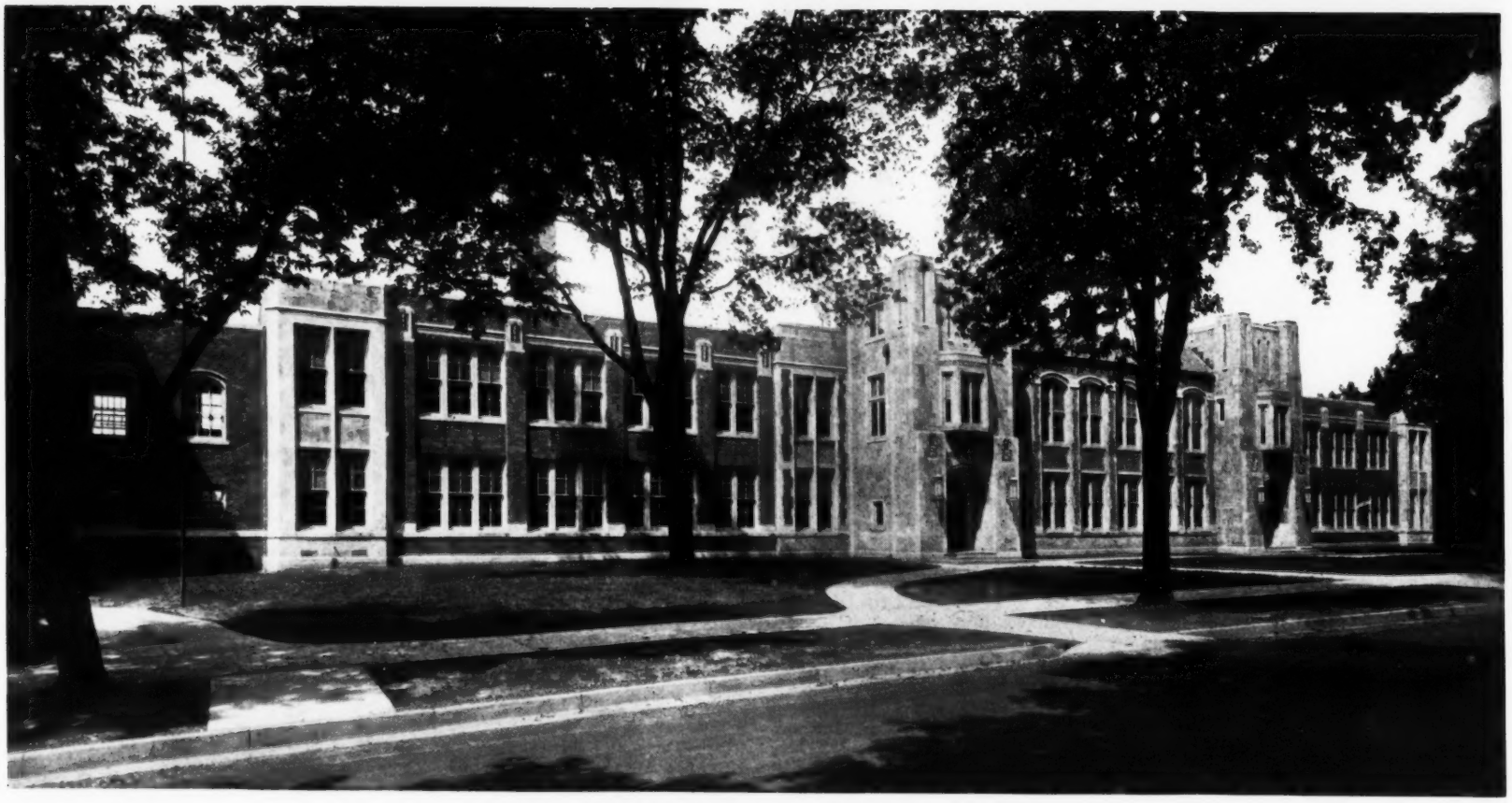


NATHANIEL HAWTHORNE SCHOOL, UNIVERSITY CITY, MISSOURI
Wm. B. Ittner, Architect, St. Louis, Missouri



HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
The Warren S. Holmes Company, Architects, Lansing, Michigan

The Hillsdale High School: A Community School

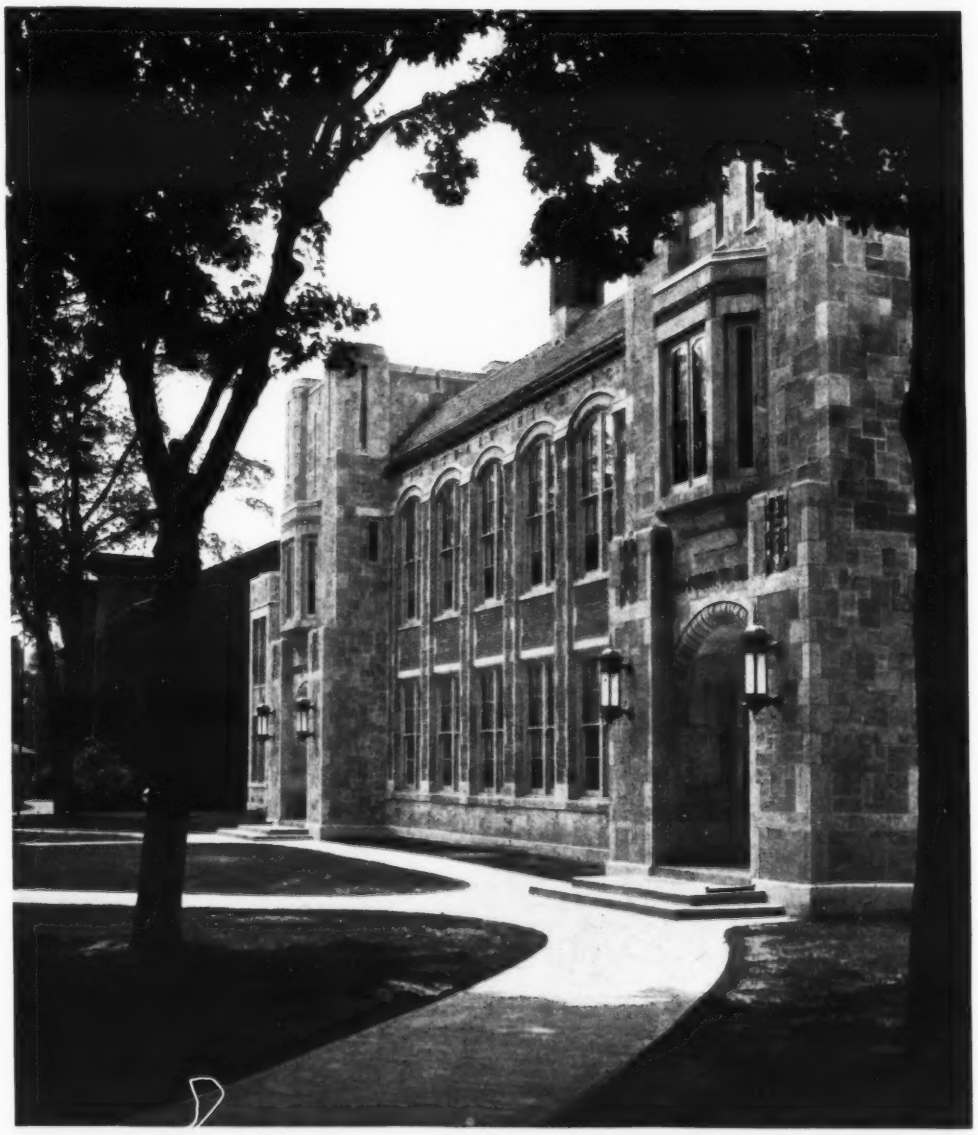
Warren S. Holmes, Architect, Lansing, Mich.

The modern school building is the finished product of the best efforts of many minds. Our present standards, as well as our philosophy of school architecture, have been evolved during many years, and a good deal of progress must be ascribed to the past thirty or forty years.

The Hillsdale High School, illustrated in these pages, is more than usual the product of many minds working to a common purpose. It is modern in design, not modern to be different, but modern to be more functional, and better to serve existing and future needs, and it is modern because it illustrates a new type of school building that corresponds rather closely to modern concepts of secondary education.

In a carefully prepared report of some hundred pages the combined effort of Supt. Erickson and Dr. Moehlman lifted Hillsdale's tradition-ridden school system out of its old inadequate and antiquated school buildings and placed it in a new theoretical organization housed in new theoretical buildings. So radical and so far-reaching were the recommendations that it took the school board and more particularly the citizens some months to digest this survey. At last the school board said, pointing to the survey, "This is it." We could not have said it this way but "This is it."

From their experience with existing old buildings which were substantially built, but impossible in modern school procedure, the board sought to avoid the mistake of the past and make flexibility a prime requisite in new schools. By so doing, this new high school has been guaranteed a useful life for many years. The ideas of today are not imposed on the school child of tomorrow. The instructions to the architect was a copy of the survey. It set up goals for the high school, laid down a school program and gave a definite description of the need. It recommended a community school where parents and adults should participate freely. Moreover, the superintendent, the educational consultant, the school board, the architect, and the citizenry were committed to this program.



ENTRANCE DETAILS, HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
The Warren S. Holmes Company, Architects, Lansing, Michigan

The site is a hillside, level in front and level in the rear, but with a 14-ft. difference in elevation, making the building two stories in front and three stories in the rear. It was desired to build up the street frontage and preserve as much ground in the rear as possible for play purposes. The long frontage dictated the two entrances. The offices are located between these entrances on the first floor, opening off one side of the foyer and the gymnasium and auditorium directly opposite off the other side. The library study is placed above the offices and extends into the two entrance towers. The lockers, showers, shop, heating plant, and cafeteria occupy the floor underneath the gymnasium and auditorium.

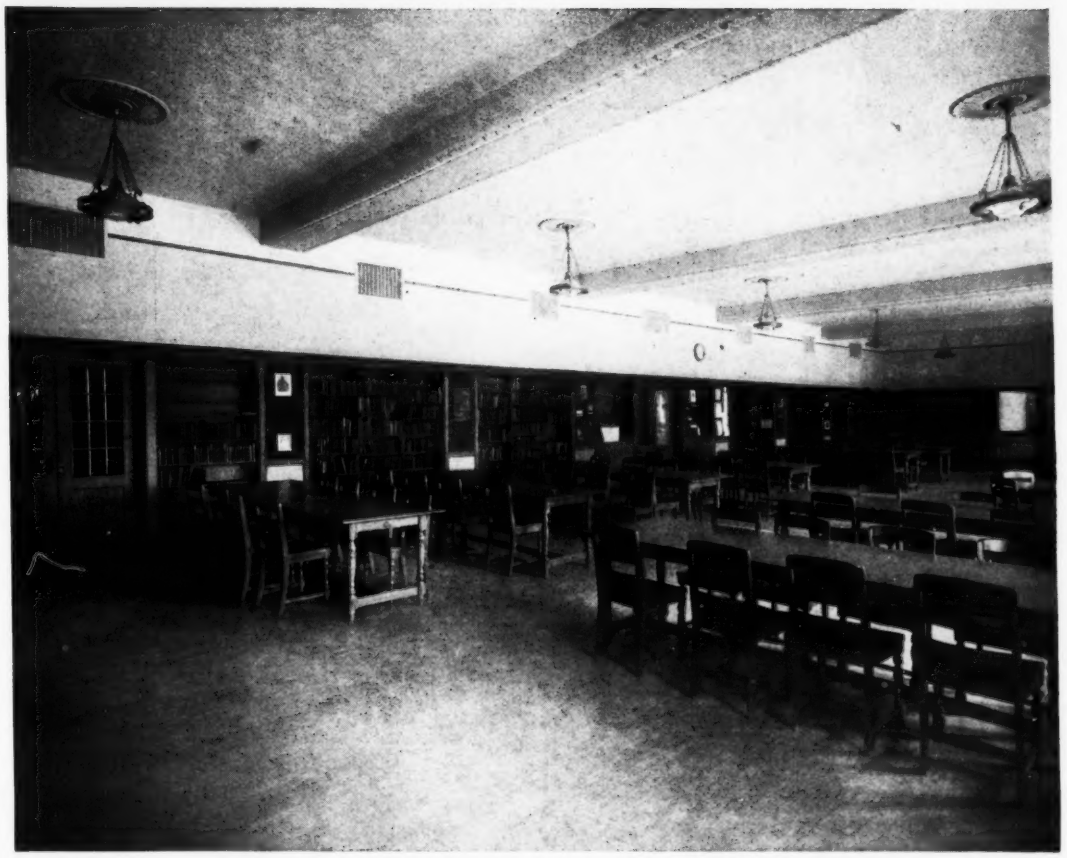
As one approaches the building the two towers stand out with imposing mass, with deep shadows and a glitter of iridescent tiles designed to accentuate the vertical lines and add decoration. Over one entrance arch is placed an inscription in bronze letters "Enter to Learn," over the other "Go Forth to Serve." On each side of these entrances are appropriate bronze lamps, and above these sculptures of students in architectural garb suggesting study, athletics, reverence, and contentedness.

There is a carved band in the entrance arches and another above the oriole windows, each containing numerous small figures symbolic of historical significance. The ashlar stonework is chat-sawed variegated Indiana limestone. The texture and coloring in this stonework is a study in itself. The words "Hillsdale High School" in bronze lettering form a decorative line above the arched windows of the library study. The brickwork is variegated colors in tones of buff and brown mat texture, laid in light mortar.

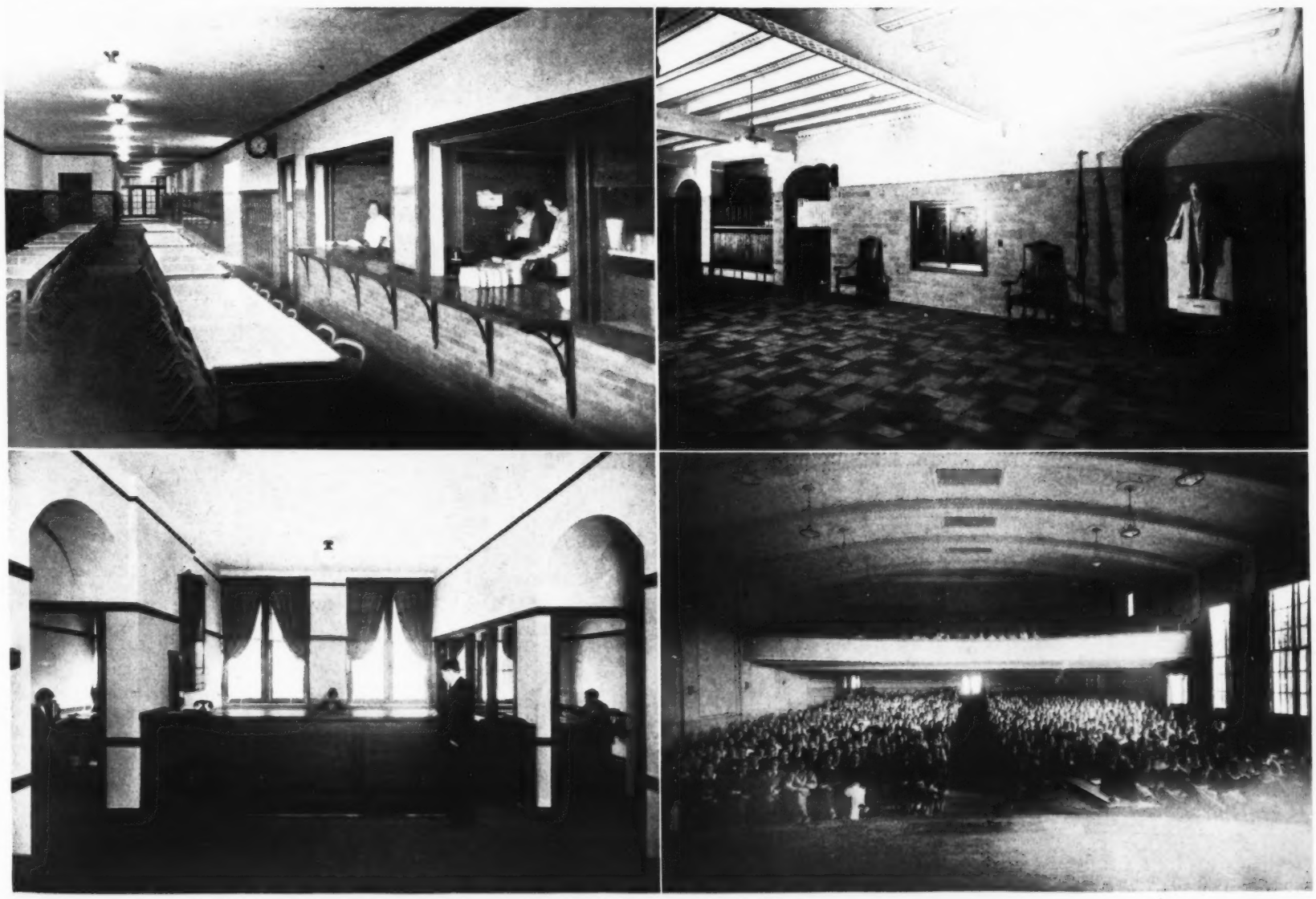
There is interest and inspiration in this front — one ever discovers something new or learns a new meaning concerning some detail.

The proportions, the materials, the color scheme, and the details clearly indicate the purpose of the building and are intended to arouse enthusiasm for it and for the work that goes on within.

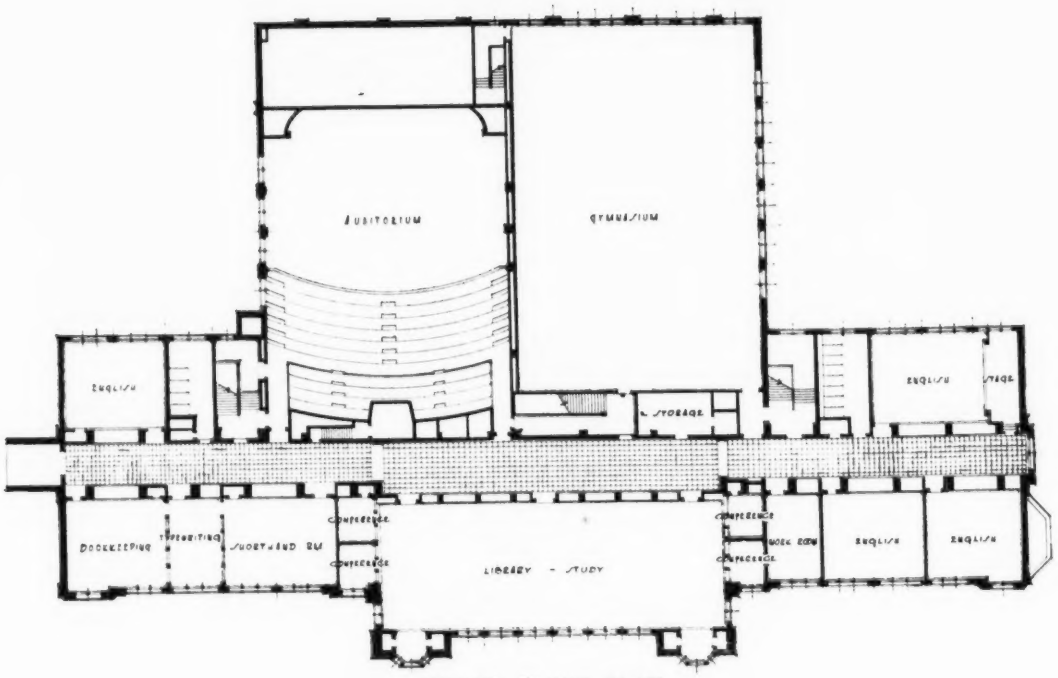
There is a tint of color in the glass of the oriole window and entrance doors. The center panel of these glass entrance doors contains a leaded glass design highly colored and very decorative to symbolize a phase of the school's work. Through these doors one gets a glimpse of the vestibule and foyer beyond, an invitation to enter and a suggestion of what must be very interesting and very much worth while within. From these doors one not only sees the attrac-



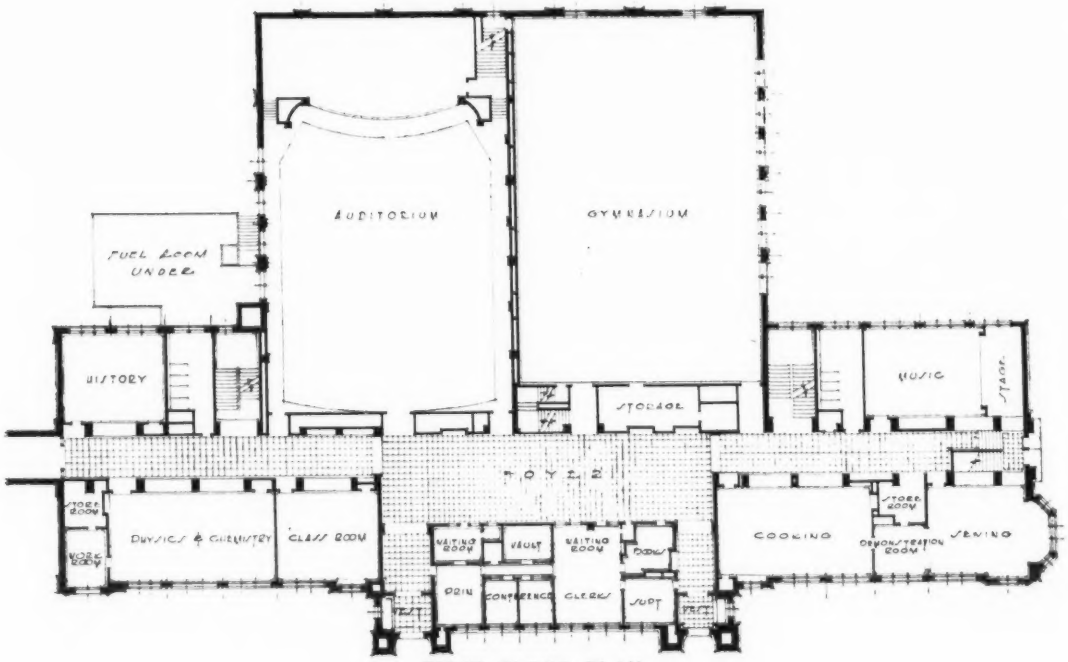
LIBRARY, HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
The Warren S. Holmes Company, Architects, Lansing, Michigan



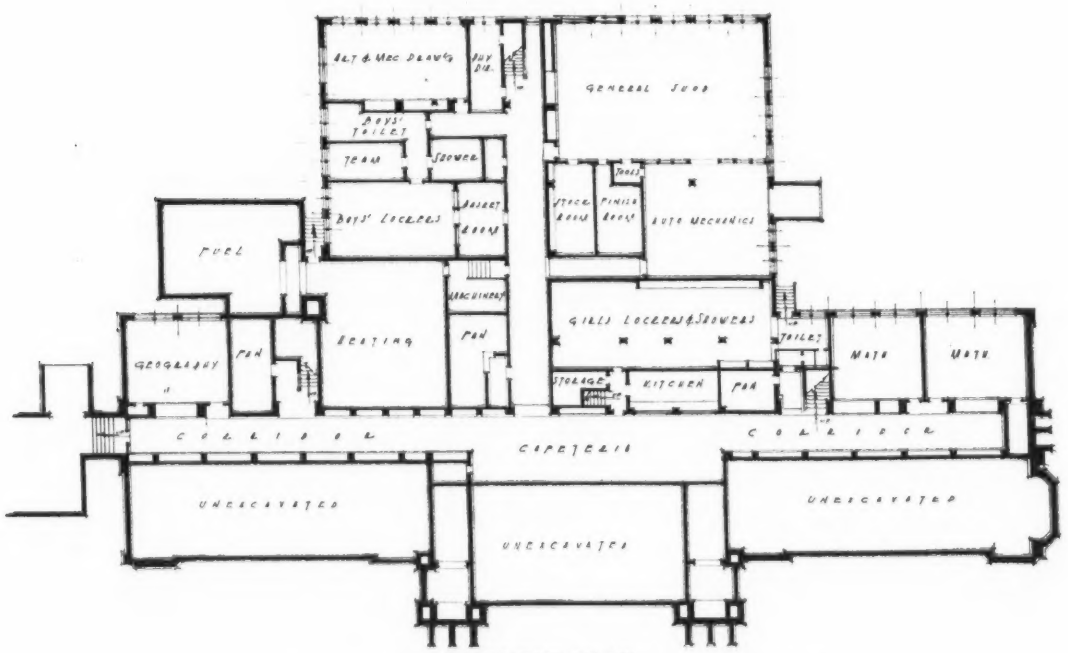
INTERIOR VIEWS OF THE HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
The Warren S. Holmes Company, Architects, Lansing, Michigan



SECOND FLOOR PLAN



FIRST FLOOR PLAN



BASEMENT PLAN
HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
Warren S. Holmes Company, Architects, Lansing, Michigan

tive architectural features of the vestibule and foyer, such as tile patterns in floors and walls, lighting fixtures, color schemes, etc., but gets a full view of the trophy case in the vestibule and one of the school's exhibit cases. From one entrance one can see the statue of Abraham Lincoln standing in a wall niche, as majestic and simple as one conceived him to be in reading his biography or by observing his statue in the stately memorial at Washington.

As one proceeds to enter the building he is attracted to the bronze plates attached to the tile walls and containing pleasing quotations and information about the building. Near the top of the tile wainscoting at regular intervals are placed figured tiles designed to be decorative and instructive.

The view of the foyer illustrated is the one seen from the right-hand entrance. The metal balustrade at the extreme left of this view is part of a stairway leading to the second floor. The wood panel work below this balustrade is the back of a wall bench. Directly opposite this stair and wall bench are the doors to the offices. These doors have side lights so one can see the entire layout of the offices from the foyer at a glance. There is educational purpose back of each feature. This foyer is designed to foster a fine relationship between students and between students and faculty and between the community and the faculty. The superintendent, the principal, and the clerks no longer stand in the light of administrators to make rules and impose system on the school's work, but rather they are made to appear as friends, servants, and benefactors to students, teachers, and parents. The beauty, conveniences, and welcome of this place makes an appeal to all who enter and fosters optimism, ambition, and good will. The social-privilege room is connected with the offices and opens off the foyer. This room serves as an office for the dean of girls, a place for student meetings, teacher meetings and as a reception room for public functions. The beautiful grandfather clock is a gift from the alumni to show their approval and appreciation of this part of the school.

The library study is centrally located and sufficiently attractive to be the most important room of the school. Committee rooms for group work are located at each end, under full supervision of the teacher. The seating is as informal as consistent with the numbers that have to be accommodated. Interest, comfort, and beauty are combined here to facilitate student control and release the teacher's time for helpfulness to earnest students.

The beauty of the building is consistently carried into the auditorium and gymnasium with good materials, acoustical treatments, and attractive decorations. The placing of the gymnasium and auditorium side by side is a good arrangement, both economical in construction and very practical for use as one ventilating wall serves both rooms and the stairways and exits can be used with each interchangeably.

The ends of the corridors are kept open for good light, and the corridor further is made attractive and usable by building in lockers, exhibit cases, ornamental recesses for drinking fountains, recesses for classroom doors, bulletin-board space and at strategic points panels for pictures, etc. The corridors and stairways are of terrazzo with tile wainscotings having seats built in here and there to invite informality. The windows on the stair landings have been made ornamental features from the interior, with sills sufficiently low to give charming views of the landscape and residential sections of the city, ever a reminder of considerations beyond the schoolhouse doors.

The building is departmentalized with the academic classrooms on the second floor near the library study; the sciences, domestic science, and music on the first floor, and the health and vocational work on the first and ground floors. The cafeteria is formed by widening the corridor of the ground floor. The corridors of the ground floor have a wainscoting of salt-glazed brick.

The classrooms are by far the most interesting part of the building. Each classroom is designed for a particular purpose, with ample built-in features to provide for student club work, the activities of the class, and provision for taking care of material brought in by students and teachers. A reading case, letter file

(Continued on Page 123)

GREAT NECK HIGH SCHOOL, GREAT NECK, LONG ISLAND, NEW YORK
Guilbert and Betelle, Architects, Newark, New Jersey

A High School Planned for Expansion

The village of Great Neck, N. Y., is a high-class suburban residential district located on Long Island Sound and just outside of the boundary line of Greater New York City. Due to its close proximity to the city and the rapid growth in population there was a demand in 1928 for high-class and complete school accommodations for children of junior- and senior-high-school age. As a means of solving the problem for the immediate needs of the children and of caring most economically for the future increase in enrollment, the board of education purchased a large plot of ground sufficient to give the building in its completed form a proper setting and also to lay out a community playground and athletic field.

The building contains ample accommodations for a well-balanced high-school program suited to community needs. All the special departments have liberal space in which to carry on their work, and the architect has provided for the flexible use of rooms so that, when the structure is ultimately completed to double its present size, there will be not only an additional gymnasium, but practically all the present departments of the school can be doubled in capacity by merely shifting the furniture in the rooms or removing a few partitions.

The building was planned in 1928 and construction was started on April 21 of that year. The work was completed in the summer of 1929 and the building was first occupied in September of that year.

A curve in the road upon which the building fronts and the desirability of making full use of a drop in the grade from the front to the rear of the site have been utilized in arranging not only the front of the building, but also in placing the gymnasium and other larger rooms of the structure.

The building is designed in the Colonial style which is quite in harmony with the history and earlier architecture of the community. The exterior has been worked out in red brick, with limestone trim and a green slate roof. The construction throughout is fireproof with brick

GREAT NECK HIGH SCHOOL, GREAT NECK, LONG ISLAND, NEW YORK
Guilbert and Betelle, Architects, Newark, New Jersey

GREAT NECK HIGH SCHOOL, GREAT NECK, LONG ISLAND, NEW YORK
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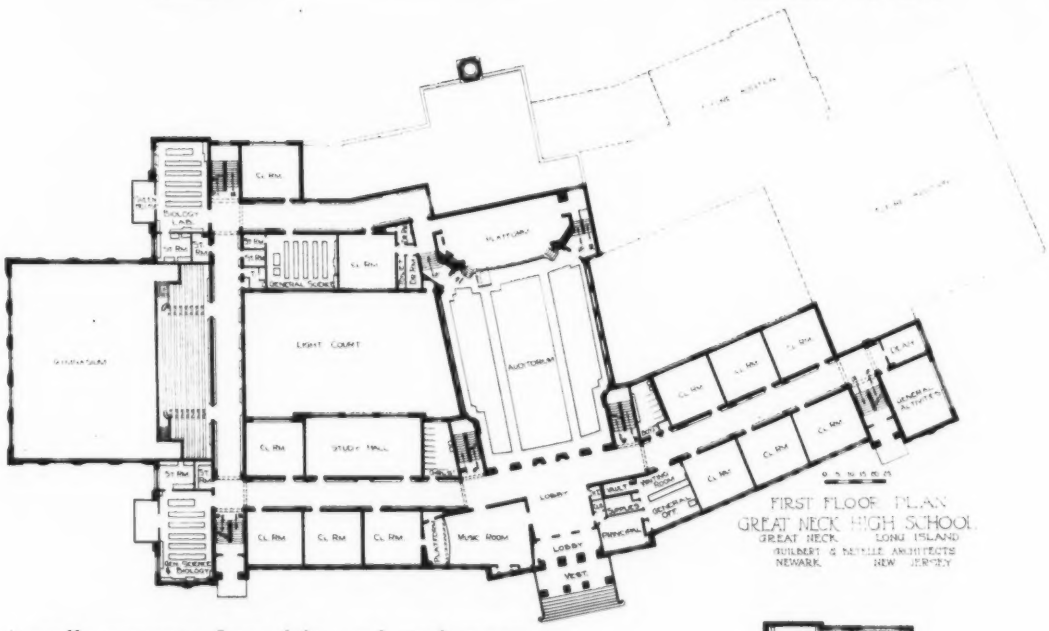


walls, concrete floor slabs, and steel construction over the larger spans of the auditorium and gymnasium. The nonbearing partitions throughout the building are of terra cotta. The corridors and stairs have glazed-brick wainscot, plaster walls and ceilings. For most of their length the corridors are lined with lockers. The classrooms, library, etc., have plaster walls, chestnut trim, and hard maple floors. Toilet rooms are finished with tile floors and walls and metal toilet partitions.

The larger rooms for general use are an auditorium measuring 64 by 84 ft., containing 922 seats. The cafeteria occupies space under the auditorium and measures 43 by 106 ft. The gymnasium has light from three sides and measures 60 by 80 ft. A smaller gymnasium for girls and for special corrective work measures 22 by 38 ft.

The architects have very carefully considered the community use of the building. The auditorium, cafeteria, and the library are practically an independent unit which may be cut off by means of gates in the corridors of the basement, first, and second floors. For small group gatherings the music room is quite ample with its stage and its special seating. The heating equipment is so arranged that the auditorium, the cafeteria, or the library can be heated independently of the balance of the building. The stairways adjoining the main lobby will give access to the basement or the second floor without permitting visitors in the evening to have access to the balance of the school.

The building is heated with direct steam radiation and ventilated by means of unit ventilators. The plumbing and sanitary equipment is of the heavy duty school type. The electrical equipment includes carefully planned lighting for the night use of all departments. Electric clocks, a program system, innercommunicating telephones, and a radio outlet in each room are provided.

The building has a total pupil capacity of 1,332 pupil stations. It contains 1,950,000 cubic feet and cost $907,000, exclusive of land, equipment, and architects' fees. The cost of construction was $733,000, the heating and ventilating $97,260, electric wiring $29,303, plumbing and sanitary installations $47,500. The cost on the cubic basis was 46½ cents per cubic foot. There are 1,464 cubic feet per pupil and the cost per pupil is $681, which is very low considering the fact that the building was erected about the time of the building cost peak and under typical New York City conditions.

The architects are Messrs. Guilbert & Betelle, Newark, N. J.

FLOOR PLANS OF THE GREAT NECK HIGH SCHOOL,
GREAT NECK, LONG ISLAND, NEW YORK
Guilbert and Betelle, Architects, Newark, New Jersey

Schoolroom Ventilation of the Last Forty Years

D. D. Kimball, H. E., New York, N. Y.

A period of forty years embraces about the entire span of practical schoolroom ventilation. Prior to the early 80's of the last century but little had been done in schoolroom ventilation. About 1888, after conferences with doctors and others interested in schoolroom conditions, a rule was adopted by the Massachusetts authorities providing that schoolrooms should be ventilated and that a definite amount of air should be introduced and exhausted from all schoolrooms. The standard then adopted was 30 cubic feet of air per pupil per minute, and this became known as the Massachusetts standard.

The basis of determining this air standard was the old CO_2 theory, then prevalent, the theory being that this quantity of air was essential to prevent an accumulation of CO_2, which was then of itself generally regarded as a harmful element. In other words, all schoolroom ventilation requirements, as well as ventilation requirements generally, were based upon the chemical composition of the air of occupied spaces.

In these early years of schoolroom ventilation gravity systems prevailed very generally. Many of them were of the furnace type, later developed especially for schoolroom work, these becoming known as warm-air-furnace systems. Gravity exhaust flues were usually provided also, one for each room. Gravity indirect steam radiators were also utilized for the heating of the air supplied to the schoolrooms, one such indirect radiator being provided for each room, with a gravity exhaust flue for each room, as in case of the furnace systems. Usually these exhaust flues were equipped with a small steam radiator, known as an accelerating radiator, although in some buildings gas jets were occasionally inserted in the exhaust flues to serve as a means of accelerating the flow of air through the exhaust flue.

Early Conceptions on Ventilation

Many of these early gravity systems were very crude, but some of them were developed and installed in such a way as to prove quite efficient. The greatest weakness of these gravity systems of ventilation lay in the fact that the quantity of air thus to be provided was specified upon the basis of an assumed average outdoor temperature giving a certain differential of temperature between that of the outdoors and that of the schoolroom. As the outdoor air grew warmer this differential became less, and the quantity of air supplied to and exhausted from the schoolroom also became less.

Later, fans were added to these systems, designed along gravity lines, to assure a supply of air independent of outside temperature conditions, and such systems proved quite efficient and satisfactory.

Soon larger school buildings were erected, and the fan systems of ventilation with which we are all familiar became common. Usually these consisted simply of a heating stack with a blower from which ducts were led to the various schoolrooms. In practically all cases the air was discharged into the room about eight feet above the floor level, and was exhausted from the room at the floor level. Exhaust fans became common about this time, replacing the accelerating radiators formerly used in the exhaust flues.

These early fan systems were installed generally without air filters, although muslin air filters were sometimes used, without humidifiers, and even without automatic temperature regulation, the latter coming into use early in the 90's in school buildings.

In the early years of the present century air washers commenced to be introduced into school ventilating systems, and with them artificial humidification was introduced into the schoolroom.

Variety of New Systems

At this time the forms of schoolroom ventilating systems being installed were many and extremely varied. All of the old systems were still prevalent, "split systems" (fan ventilation combined with direct radiation in the schoolroom) were largely used, "blast systems" (without direct radiation in the schoolrooms) were also largely used, "double duct" systems were sometimes used, and individual duct systems (perhaps the acme of schoolroom fan ventilating systems) were occasionally installed.

The cost of the installation was very often the governing factor in the selection of a schoolroom ventilating system. The quality of materials, the type of system, and the real results to be obtained, were less often allowed to be the governing factor in selection. Quite possibly these latter considerations are still too often the basis of selecting the ventilating system to be installed, or the selection may be influenced by aggressive salesmanship on the part of equipment manufacturers. Again the architect then was, and now is, faced with the requirement of building so much of a building for so much money, and only the cheapest systems and materials may be used to accomplish this end.

About 1910–12 school ventilation became the subject of most vigorous attacks, allegations being made that it was most unsatisfactory and inefficient, and even needless. This agitation resulted in a number of important investigations and studies of schoolroom ventilation, including those of the Chicago Ventilation Commission and the New York Ventilation Commission. Then ensued a stormy period of investigation and debate during which all sorts of schoolroom ventilation systems were advocated and used, including a few of the so-called "open window" ventilating systems. About this time there was introduced the schoolroom "ventilating unit."

Problem of Ventilation Clarified

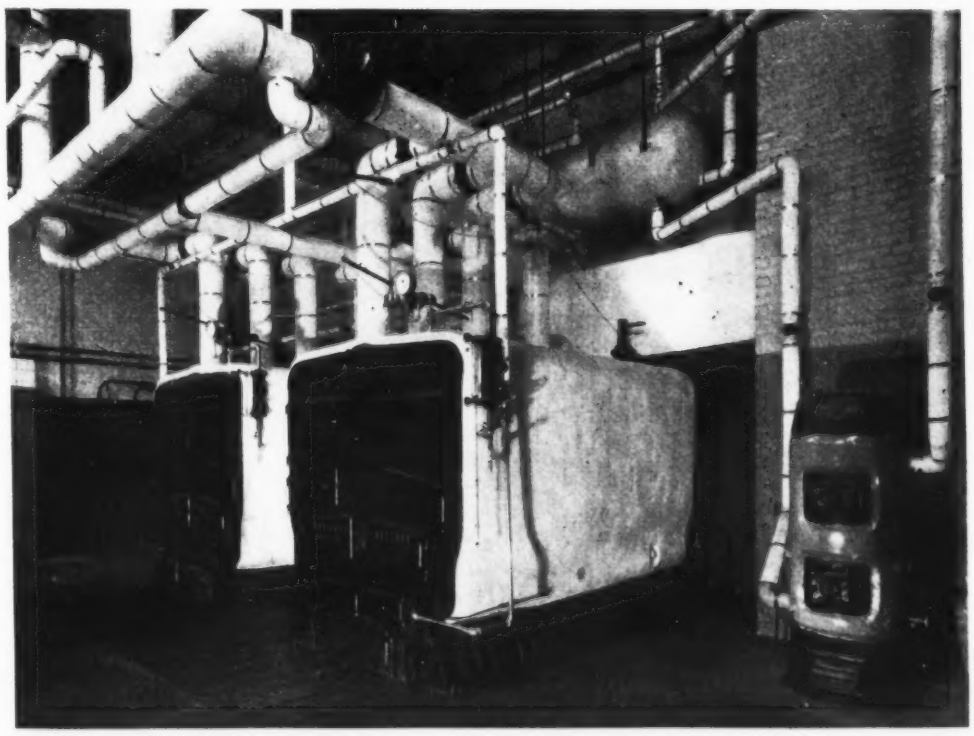
These years of investigation, study, and experimentation have done much to clarify the problem of ventilation as to its fundamentals, but have not resulted in a standardization of schoolroom ventilating systems. We are now agreed that the thermal qualities of the schoolroom atmosphere are the important qualities, while the chemical characteristics of the air of the schoolroom, within the range of common schoolroom experience, are of less importance. We do want clean air, but most important is a correct temperature and a sufficient air movement. Excessively dry air, or a too-humid atmosphere, are not desirable, but inasmuch as the permissible range of relative humitity is very wide, there is no assurance that the artificial humidification of schoolrooms is at all necessary. The preponderance of evidence seems to point to the contrary.

Other than for the smaller school buildings the furnace system is now rarely used. The gravity steam ventilating system also is but little used now. The open-window system has not received a general popular approval, and has not become generally used, although the restrictions of legal regulations doubtless accounts for this to some extent.

Following the adoption of the Massachusetts Standard a legal requirement of 30 cubic feet of air per pupil per minute was made a legal requirement in many other states, while still other states set up some form of ventilation requirement applicable to school buildings. Some of these required a "positive" supply of air, which requirement could only be met by some form of fan system, or with the unit ventilation system. The general result has been that the central fan system and the unit ventilation system have become the prevalent methods of schoolroom ventilation. The choice between these two systems, as far as general tendencies seem to indicate, has become purely a matter of personal preference.

It would be a difficult matter to prophesy along which of these lines or upon what line future schoolroom ventilation will progress, as both methods of schoolroom ventilation have strong adherents. The fan system as designed by the best authorities will include both supply and exhaust fans, means of air filtration, automatic temperature regulation, and perhaps means of artificial humidification automatically controlled. The unit ventilation system will include individual schoolroom units with filters and automatic control, with individual room exhaust flues, and preferably exhaust fans.

Should the legal requirements of some of the states be relaxed or repealed, it is possible that window ventilation along the lines indicated by the New York State Commission may be more widely used, particularly for schools in rural districts.



A TYPICAL SMALL-SCHOOL BOILER ROOM
BOILER ROOM, TISBURY SCHOOL, VINEYARD HAVEN, MASSACHUSETTS

Public Recreation in 1891 and 1931

Weaver Pangburn, New York City

What was happening in public recreation in 1891? In brief, not very much. In the principal cities, for the most part, the idea was germinating, so to speak.

In a few communities the year stands for the actual starting of playgrounds. Some of these attempts were abortive. For instance, the New York Society of Parks and Playgrounds with Bishop Potter, Felix Adler, and Charles Parkhurst among its charter members, in that year opened its first playgrounds equipped with swings, seesaws, small wagons, wheelbarrows, shovels, footballs, drums, flags, and a sandpile, on the upper East Side. The playground excited immense interest in the city. On Saturday, November 21, 27 prominent Jewish rabbis spoke before their congregations on the need of playgrounds for children. On the next day, 100 Christian clergymen preached on the same theme. It looked like the movement had been launched on the high tide of popular favor. But nothing much came of it.

Three or four new playgrounds were opened, but no more important step, except the opening of a few private playgrounds, was taken until 1897 when $25,000 of municipal funds were secured for vacation schools and playgrounds in the Borough of Manhattan and $5,000 in Brooklyn. This made possible thirty playgrounds conducted for a period of two months. One hundred and twenty-five teachers were employed.

It was about 1891, however, that the municipal-park movement began to get under way in earnest in the United States. A national association of park executives was formed during the 90's.

Beginning of Organized Playgrounds

The actual beginning of the modern organized playground in America is credited to Boston, whose sand gardens were opened in 1885 under matrons and given more competent leadership in 1886. These humble municipal efforts were the result of many influences — the work of social settlements, antislum campaigning, housing reform, and the attack on tuberculosis.

The vacation schools made a big contribution in the teaching of manual work, usually carpentry, singing, and nature study. In Chicago, weekly excursions were made into the country.

In 1892 the first playground in Chicago with play leaders and modern equipment was established in connection with Hull House. Six years later the women's clubs of the city carried on six playgrounds for eight weeks in school yards. In those early days many school yards were utilized as playgrounds, but rarely under the auspices of school boards. Usually a privately organized playground association or some other private agency established and maintained the program. Yet in Philadelphia in 1898, the board of education took control of the playgrounds in that city and a similar action was taken in Cleveland in 1903.

The first early example of generous and statesmanlike planning for public recreation was in Chicago. In 1903 the South Park Commission opened the magnificent playgrounds and field houses which called forth President Roosevelt's statement that Chicago had made "the most notable civic achievement of any American city." In two years the people of Chicago had taxed themselves $10,000,000 for park and playground purposes.

The National Association Founded

The number of cities reporting organized playgrounds had grown to only 41, when in 1906, the Playground Association of America, now known as the National Recreation Association, was formed in Washington, D. C. It at once gave a national momentum to the spread of the movement. From now on we witness also a steady broadening in the types of activities, which hitherto had been confined to play on the apparatus, games, and folk dancing. Educational values of play were thoroughly recognized by the Association, for in its constitution it stated, among other objectives, that it proposed to "further directed play in connection with schools."

Indeed schoolmen and schoolwomen had a great deal to do with the founding of the association. Its first president was Dr. Luther Gulick, supervisor of physical education of the board of education of New York City. On the first executive committee were Principal Myron T. Scudder, of New Paltz, New York; and Supt. P. P. Claxton, of Knoxville, Tenn.

Public Recreation Today

Forty years have produced many sharp contrasts in this new movement. Parks have been utilized generously for municipal golf, tennis, boating, picnicking, pageantry, athletics, and playground activities. They used to be thick with "keep-off-the-grass" signs, with passive recreation and rest as their chief function. Forty years ago, playground activities were almost exclusively physical. Today a progressive program includes dramatics in all its forms, such as storytelling, circuses, plays, pageants, puppetry, and festivals; music in many forms; handcraft; drawing and painting; water sports; winter sports; social recreation, and other community-center activities; and nature study. The attempt now is to contribute to every phase of development.

At its outset, public recreation was strictly a children's playground movement. Today the patrons of public recreation are almost if not fully 50 per cent adults. Equipment then was confined to play apparatus and game materials. Today one observes wading pools, swimming pools, tennis courts, golf courses, gymnasium, athletic fields, camps, and evening recreation centers.

Then, private voluntary effort secured and maintained playgrounds through tag days, bazaars, and public subscriptions. Today, according to the most recent statistics (1929) 84 per cent of the year's expenditure of over 33½ million dollars for public recreation is tax money. Space standards for playgrounds have changed from an acre to every 1,000 to 1,500 children to a standard of three to five acres as a minimum for every elementary school, and ten to twenty acres for junior and senior high schools.

To meet demands made upon it by this rapidly extending and broadening program throughout the nation, the National Recreation Association has added to its staff field secretaries and specialists. In place of the first pioneer loaned by the Russell Sage Foundation, Lee F. Hanmer, there are now fourteen field secretaries and specialists in games, dramatics, music, rural training, colored work, parks, women's and girls' work, play in institutions, recreation areas in real estate subdivisions, physical education, and other activities. Much of the association's work is focused on training. Annually thousands of individuals from various organizations participate in training classes in which the specialists just referred to have an important place. The association also maintains a graduate school in New York City to which a limited number of especially qualified college graduates are trained professionally for public recreation.

Parks and Playground Areas

Today one notes that parks and playground areas together with their recreational uses are an essential part of all city planning worthy of the name; that 137 colleges and universities have training courses for leaders in recreation and physical education. It is very significant that the modern school includes training in recreation skills and training for the wise use of leisure, the latter, one of the seven cardinal objectives of the National Education Association.

The early playgrounds were significant chiefly for the safety, educational development, health, and moral growth of children. Of course, nothing could be more important. This holds equally for today, but, in addition, provision for public recreation is seen as provision for the growing leisure of everyone in the country. Its importance must be viewed against the background of the five-day week and possibly the six-hour day, which are in prospect.

In contrast with 1891 with scarcely any municipal recreation agencies, today, 119 boards of recreation and school authorities have assumed this responsibility. However, in 205 cities park commissions, boards or departments; and in 204, playground and recreation commissions, boards or departments administer the activities. In a total of 700 cities, recreation is administered by some department of the local government, in only 245 cities by private agencies. Some educators are saying that the play activities of children should be administered entirely by the schools, and there are examples of schools that do so. For instance, Milwaukee and Gary, Indiana. And in Cleveland, Chicago, New York, Boston, St. Louis and other cities extensive recreation programs are developed by school departments along with those by park or recreation departments. There is no uniform system throughout the nation. If the new commission of the National Education Association on the enrichment of adult life is an indication, schools at large will quite generally be doing what a few are now engaged in — providing rich recreation programs for adults. And the time will come when school buildings, instead of standing idle a great part of the time, will hum with adult activities in the evenings just as they do now by day with the activities of children.

If one looks ahead one must see that despite the advances of the past forty years, public recreation is only in its infancy. Nearly 1,000 cities report organized recreation, yet most of them have only summer programs. In 1,300 communities of over 5,000 population no organized play is reported. No city in the United States today has enough playgrounds to meet the accepted minimum standards of child needs. There is much to look forward to in program enrichment, better integration with the educational system, and closer relationship to city planning.

In the training of more and better leaders must lie the answer to the question, "What will the future bring forth?"

FORTY YEARS OF SECONDARY SCHOOLS

The statistical information regarding secondary schools covering the period from 1891 to 1931 is recorded as follows:

	1891	1926	1931 (Estimated)
High Schools..	2,773	21,700	24,000
Instructors	8,270	169,538	180,000
Students	211,596	3,757,466	4,000,000

In 1891 the total number of students in attendance in private academies was 98,400. The statistics for 1928 show that the attendance for that year was 269,249.

Forty Years of School Seating

Henry Eastman Bennett, Ph. D., Research Director, American Seating Company

Since the SCHOOL BOARD JOURNAL first looked upon education, progress in American schools has been revolutionary to a dazzling degree, astounding in extent and profound in character. Anything in the way of curriculum, methods of teaching or texts which is forty years old is not only obsolete, but will soon be lost to history unless preserved in a museum. The then and now systems of organization, administration, and supervision are as different as a Cadillac is from a buckboard.

The most "magnificent and enduring monuments" of the then school architecture are now the bedizened structures, giddily towered or gaudily painted, which characterize and symbolize those disreputable sections of the cities between the business and the residential district, where plutocrats once lived, but now abandoned to "racial groups" and the sway of poverty and vice. Not a detail of their structure or design would be tolerated in a building of today. The truly modern school building — Well, what's the use? It isn't our privilege to descant upon it. Just check through the plans and specifications and see if you can find a single item that could even have been prophesied forty years ago. It is a commonplace that the whole environment, outlook, and life of the child has changed more in the past forty years than in as many decades or centuries preceding, and it is equally true of his school — with one exception.

In the matter of classroom furniture, the picture is different. Forty years ago, commercially made desks had already pretty well replaced the split logs and homemade wood benches of various designs. These primitive relics of local art and industry remain only in a few remote districts, perhaps nowhere in earshot of a locomotive or automobile. But of the early "patent desks," made of cast iron and slats and screwed to the floor, it has been estimated that 60 to 80 per cent of those in use forty years ago are still in service. Many a grandparent visiting the school can point out the very desk in which he sat and occasionally can disentangle from overlying artistic efforts the traces of his deep carved initials on the desk top. More often the little desk, planed off, sanded and refinished, rejuvenated and unrecognized, stands in some newer building in another part of town. Hundreds of thousands of these old desks, smelly and defaced, grown forty, forlorn, and dilapidated, still contact five hours daily with the hands and clothing of successive generations of pupils and impinge upon the consciousness and ideals of their occupants more closely and persistently than does any other thing.

Some of them bear no evidence of attention except from pupils' pencils and pocket knives. Some, under the influence of sanitary regulations, have been subjected to annual disinfection and decennial revarnishing. Others, in better-kept schools, have had their biennial refinishing, like the Saturday-night bath, "whether they needed it or not."

Crude Products of Former Days

Shining bright among these ancient veterans are the thousands that have been sent to the school shops, dismembered, broken parts replaced from the junk pile, refinished, reassembled, and returned to duty in modern buildings, upon the theory that a school desk should serve the youth of the land until cast-iron wearies of standing and woods are worn through by pencils and pants. These units, costing about a dollar and a half each originally, are rehabilitated at an expenditure or two or three times as much and (with much publicity about savings to taxpayers by an economical administration) are expected to serve for good or ill another decade or two. But these were the crude products of the early days of the seating industry. Desks of similar type are better made now and with similar treatment may be expected — God help us — to last a century.

Still more surprising perhaps is the fact that of the millions of desks which have been purchased and installed in the schools during the past four decades, an overwhelming majority of them are indistinguishable from these ancient patriarchs except for slight mechanical improvements, a sanitary smoothing out of the rococo castings, and changes in the color of wood stains. Desks are still made and sold which apparently might have been made from the same patterns and finished with the same machines that were making desks when the SCHOOL BOARD JOURNAL first appeared. With the development of formed steel construction, cast-iron standards have passed into obsolescence, but more than half of all the desks installed within the past year have been of the same general design as those of forty years ago. The best of them seem to have evolved to the limit of durability, mechanical excellence, sanitary construction, and refinement of finish, but as far as fundamental ideas are concerned, the most popular desk of today is merely a polished-up brother of the veterans of a half century of service.

Several facts help to account for this island of stagnation in the river of progress. It must not be supposed that educators have been ignorant or writers on school hygiene silent on the educational inadequacy or the physiological evils of the prevalent seating of schools. There is, perhaps, no educational question on which there has been more complete unanimity than that traditional school desks are antagonistic to modern ideals of instruction and discipline that they are definitely productive of serious defects of vision and posture, of generally lowered vitality, and of numerous specific physical injuries. It would be easy to fill a whole number of this magazine with quotations and statistics prepared during its lifetime, to prove that traditional seating is physiologically an unmitigated evil, productive of deformity, ruinous to eyesight, a medium of contagion, demanding abnormal postures and making them habitual, and that it is the bugbear of school hygiene and modern socialized instruction. Apparently everyone has known that school desks were all wrong, and nearly everyone has known what to do about it except those who could really do something.

An Era of Invention

Nor is it to be supposed that no one has had the initiative to do anything about the matter. An enormous number of patents have been issued for every conceivable device which by any stretch of the imagination could be called a school desk. Innumerable teachers have gone without new suits (and patent lawyers have got them) in the fond belief that they had at last discovered the solution of this vexed problem. A small proportion of these devices have been sufficiently sane to persuade somebody to put money into them and have actually got into production.

A study of the advertising pages of this JOURNAL would reveal an astonishing number of forgotten "perfect solutions" of the seating problem. Presumably each of these had some merit, but nearly all met the same fate. Some were installed only to cause so much more trouble than they cured that they were soon added to the long list of commercial freaks, fads, and failures. A few conservative types have succeeded, but rather because of the manufacturing and selling facilities which they were able to get behind them than because of any radical or cure-all features.

Let us review rapidly some of these more or less abortive "solutions of the problem." It will be more profitable (and a great deal safer) to generalize upon various angles of the problem, rather than to specify particular inventions and products which have been offered.

Perhaps the most obvious and apparently the most easily settled of these problems is that of heights in relation to the pupil. For more than two centuries it has been pointed out countless times in no uncertain terms that both seats and desks of pupils are generally too high for them. It is still true. During a full century past there have appeared from time to time literally hundreds of more or less scientific studies and surveys intended to answer once and for all the questions of correct seat and desk height. In Europe a technique was developed which consisted in measuring their stature by standing children against the wall, and determining the seat height for a class according to a fixed ratio to the average stature. Somebody figured that the seat height of a pupil should be two sevenths and his desk height three sevenths of his standing height, plus a half inch in the upper grades. This rule has been passed along from text to text on school hygiene without verification for a half century and is still widely accepted and wholly wrong. (There is no ratio of the sort even approximately correct for different individuals.) Presently it occurred to someone that any seat which is right for that one pupil in a class who conforms to the "average," is inevitably wrong for the others. It was found that more often than otherwise pupils in the same group would vary as much as sixteen inches in stature and hence as much as five inches in seat height according to the rule. Hence, there must be individualized seating with ready adjustability of height, so that each pupil could be correctly "fitted." Adjustable seats came into vogue and school hygienists taught that pupils should be measured two or three times a year (by standing them against the wall) and the seats and desks adjusted to the exact quarter inch according to the adopted ratio.

There was a deal of enthusiasm about all this and great faith that the millennium in school seating had arrived. Unfortunately, teachers could not get the hang of this adjusting and lacked the time or physical strength after one or two efforts, and there was no one else paid to do the job. Anyhow the wrench was lost, the whole matter forgotten, or it didn't seem to make much difference whether the seats were adjusted or not, and the succeeding teachers in the room don't know yet that the seats are adjustable.

Striving for Standards

Studies were made of many thousands of pupils in large cities to determine the probable distribution of seat heights in each grade in order to equip rooms according to scientifically established standards. In one of these cities many thousands were measured in the following native fashion: The pupil was seated on a table with feet hanging down, a book placed under his feet, and the distance from the book to the table top measured with a yardstick. Now the objections to a high seat is the pressure under the knees due to the leg weight resting there instead of upon his feet. The method of measuring described involved all the compression under the knees which the leg weight could exert, and pupils might as well have been seated an inch or a foot higher than the resulting measures. These standards, obviously some inches too high

for every pupil, were widely published and apparently accepted without challenge. What a world of measuring, statistics, printer's ink, adjusting and making excuses for nonadjusting, would have been saved by a simple rule based on anatomy and common sense — merely that there should be no pressure under the knees.

A century ago wooden desks were placed so that pupils could stand between seat and desk to recite. Reformers discovered that aggravated stoop and eyestrain, resulted from this relation of the furniture. Reforms were advocated to reduce the "distance" from seat to desk. The now traditional "combination desk" with hinged seat was developed primarily to meet this demand, since the pupil could lift the seat as he arose. In the double desks one's seatmate interfered seriously with the practice, so double desks were built with individual seats, separately hinged. School hygienists hammered away and progressively set up closer standards of spacing. But when ordinary desks were set "at minus distance," with the writing surface overhanging the seat edge, there were practical difficulties of ingress and egress and of access to the book box.

So the hopeful inventor devised many solutions. There were sliding tops, as well as seats that pushed backward and some that receded by a rotary eccentric motion. It became an educational tradition that the ideal desk should have a "plus and minus" adjustment, and this was interpreted in terms of the relation of the edge of the desk to the front edge of the seat. No one seemed to notice that the front edge of the seat had nothing to do with the matter, that the distance is a question of the relation of the edge of the desk to the place where the pupil sits and this is determined by the form of the seat and the back.

It was thirty or forty years ago that Dr. Eliza Mosher observed that there was no relation between the vertical spindle backs of kindergarten chairs and the anatomy of those who were to occupy them. She advised a horizontal slat designed to get the support where needed. The market was soon flooded with so-called Mosher Chairs, many of which had no distinctive or Mosher feature except that the back slats ran crosswise. There was a merry war of salesmen on the issue of vertical versus horizontal slat backs. The fact that any of the forms could be and were equally bad, and that any structural type might be properly formed but was not, seemed to trouble no one. The terms "correct posture" and "perfect posture" were freely used for chair designs to which "perfect imposture" would have been appropriate. Apparently it was all a problem of taking chairs made by tradition or chance and proving by vociferous advertising and argument that each was a good posture chair, without having stopped to consider what good posture actually is, what sort of back support contributes to it, or what curves and measurements are common to all of the countless backs to be supported in chairs of the same dimensions.

The Form-Fitting Seat

Then there was the effort to make chairs posturally "correct" by means of the "form-fitting seat." Nobody knew just what the form was that was to be fitted nor what variations in shape and dimensions there were in the countless forms which the same scoop in a hard board was supposed to fit. The fact that the lateral shape of the scoop has no effect on posture and little on comfort was overlooked. It was noted that discomfort arose from the pressure of the front part of the seat under the knees, so the seat was carefully scooped out under each leg, instead of merely using a lower chair. To prevent pupils sliding down in the seat, one device was a ridge across the center which simply invited them to slide until it stopped them and thus standardized bad posture at a half rather than a full slide. Another device was a deep scoop which insured the pupil sitting at the predetermined point on the seat — as long as he could stand it. No one knew and apparently no one had guessed that such are the variations among those who will use a given size of chair, that this fixing of the sitting point with reference to the seat and back must necessarily be wrong for six or eight times as many as it could possibly be right for. Scoops, hollows, and saddles in wood seats are intended to prevent one sliding forward, but in the forward direction they are necessarily very gradually sloped; whereas at the sides and rear where there should be neither support nor resistance, one is hedged in by precipitous elevations. Any elevation at the rear of a seat can have no effect but a harmful one, but nobody thought of omitting it.

Long ago it was recognized that one cannot and will not read a book which lies on a flat desk top without stooping over it to correct the visual angle. But the stooping over causes a visual strain as well as injurious posture. Though there appeared innumerable adjustable desk tops, which turn back, tilt forward, or fold up, none of them held the book where it should be. Then there were numerous desks with top adjustments for slope and height and distance. If a pupil could have done this adjusting with a wave of the hand, and had been able to select the one right combination of the three movements out of the thousand possible wrong ones, the effort might have been successful. But it required collaboration of pupil, teacher, janitor and monkey wrench to shift the top from writing to reading position and often none of the four knew a correct reading or writing position when they saw it.

Something About Movable Furniture

Whatever the reader's own point of view, he would be astonished at the number and diversity of arguments used for and against movable seating. For example, a newspaper in a large city recently presented an argument of the superintendent of schools in favor of "movable furniture" to the general effect that movable seating developed a social consciousness inasmuch as pupils facing each other around a large table were stimulated to exchange opinions, and an editorial in the paper attacked this "socializing tendency" of the furniture on the ground that it forms the pupils' minds in a standardized mold and that what is needed in modern education is more individuality. Of course, a large table around which pupils sit facing each other is not typical "movable furniture," is inconvenient, impracticable for most school uses, unhygienic and no more favorable to socializing than many other types; nor is this sort of furniture or any other seating equipment in anywise related to the standardizing or individualizing of minds. Most of such arguments are equally unrelated to the problem. Teachers have said in all seriousness that they are opposed to movable furniture because the drawers stick, it won't stay in straight lines, the seats are uncomfortable, the ink spills, and other objections some of which are the very objectives which are sought in movable equipment and others are incidental to some particular make, type, or condition or wholly irrelevant.

Usually the objections are applicable merely to the movable furniture which the teacher has happened to use and are equally applicable to much of the stationary sort. The arguments against the latter are just about as logical. Of late the contest is waging around loose tables and chairs, opponents ascribing to them every evil of posture, wastefulness, and disorder; advocates claiming for them social, moral, and educational advantages which have nothing to do with furniture, and enthusing over an idealized "homelike atmosphere," which exists in no home, would not be desirable in school, and has no relation to furniture on the price and refinement level of kitchen chairs. Everybody seems under some compulsion to take sides either for or against as if it were a matter of religion or politics. Any well-designed type of seating equipment presumably has a legitimate place and function, and most certainly has limitations beyond which its use is not advisable or effective. The term "movable seating" covers a multitude of equipment types as well as a multitude of equipment sins.

And so with practically unanimous agreement that traditional seating is wrong and with practically none as to what will make it right; with innumerable theories going off half-cocked and countless ill-considered devices claiming everything and accomplishing little in practical use, it is hardly surprising that solid, conservative progress has been lacking. It is the same old trouble that too many who have initiative and ideas would rather be starting something than thinking things through, and others would rather stand pat and not think at all. In these respects, perhaps, seating is in no different case than other things in and out of the school and its problem. But the seating mistakes of the radicals either fail to get into commercial production or rapidly gravitate to the junk heap. Like the mistakes of the doctors — they don't live to tell about it. While the mistakes of the ultraconservatives, interpreted into wood and metal, never wear out, burn up with difficulty, and are insensitive to criticism or to the suffering they inflict.

Need for Scientific Approach

The need is for educational leaders who will think things through scientifically, who will experiment without thought of confirming a previous opinion, without effort to make a hasty selection among samples of types, all of which are imperfect combinations of good and not-so-good features, who are genuinely concerned with coördinating all knowledge, suggestions, and criticisms, to the end of evolving the best possible equipment for every distinct purpose and set of conditions. There is need for a great body of conservatively progressive administrators who will study such findings without bias, without caring to justify their adherence to any school of thought or opinion, and who will labor with open minds to provide the best equipment possible and to secure the largest possible values from it.

There is need for purchasing agencies who will insist upon having well-poised and discriminating expert guidance and who will follow it; who will not be obsessed to make a public showing either for revolutionary achievement or for niggardly economy. There is need for a friendly collaboration of reputable manufacturers and distributors in developing and adhering to sound principles of a seating science, in interpreting the highest ideals into the most effective commercial products; and there is need for a most drastic elimination of extravagant and baseless claims in advertising and sales arguments; and for the elimination of the conscienceless and irresponsible pirates who steal the designs of the better products, make them shoddier, and sell them cheaper to price-minded school boards.

For it cannot be doubted that the retardation in seating development has been due in large part to the industrial and commercial conditions which are involved. Methods of buying have discouraged genuinely progressive methods of manufacturing or selling. Doubtless the industry has a bad reputation to live down, but many of the laws, regulations, and practices governing the action of school boards are perpetuating the conditions they were designed to contend against and are seriously hindering the development of the industry in accordance with the higher ideals of modern business. The farce of having dozens of salesmen demonstrating innumerable samples (especially prepared) at a single sitting of a school board, with the farce

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The School Board Journal and the N. E. A.

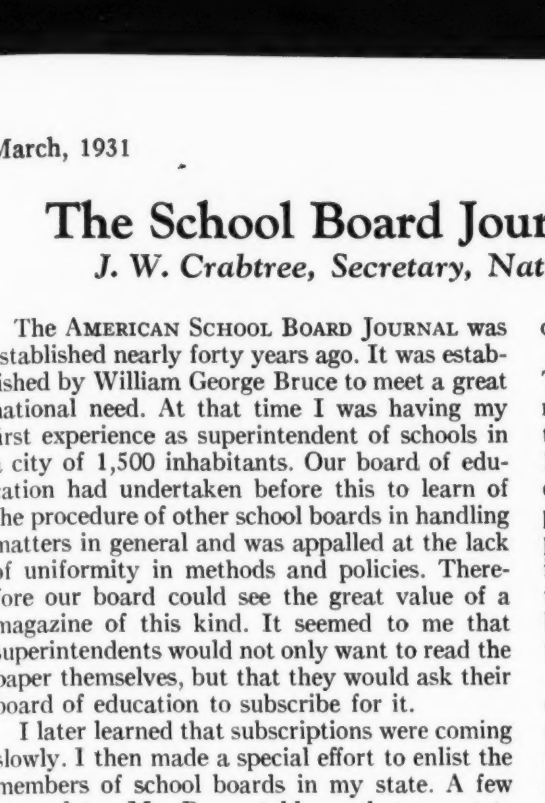
J. W. Crabtree, Secretary, National Education Association

The AMERICAN SCHOOL BOARD JOURNAL was established nearly forty years ago. It was established by William George Bruce to meet a great national need. At that time I was having my first experience as superintendent of schools in a city of 1,500 inhabitants. Our board of education had undertaken before this to learn of the procedure of other school boards in handling matters in general and was appalled at the lack of uniformity in methods and policies. Therefore our board could see the great value of a magazine of this kind. It seemed to me that superintendents would not only want to read the paper themselves, but that they would ask their board of education to subscribe for it.

I later learned that subscriptions were coming slowly. I then made a special effort to enlist the members of school boards in my state. A few years later Mr. Bruce told me that my state drive marked the beginning of better days for the JOURNAL. I now take pride in having shown personal interest in that outstanding magazine from the very beginning.

This paper and Dr. Winship's *Journal* have had an important part in the development and growth of the National Education Association, one in its capacity as a clearing house of the best in school-board administration and the other in its fearless discussion of values and in its promotion of high ideals. These magazines have been outstanding in their influence on the schools of the nation.

These forty years have been years of great educational progress. During the first half of this period the foundations were laid on which



N. E. A. MEMBERSHIP GROWTH, 1918-1930

to build a thoroughly organized profession. It marked the time when trusted leaders such as Harris, White, Mrs. Dorsey, Eliot, Jordan, Butler, Soldan, Pearse, Gove, Blewett, Parker, Winship, Mrs. Young, and others met often and deliberated on fundamental issues. A basis in philosophy as well as in practice was gradually evolved. In those years the Association was small because it was composed largely of men and women in administrative positions. Now and then someone was bold enough to say that we had a teaching profession, but there were always others ready to challenge the statement. The ideals for a profession were yet in the making. The best thinking of great minds thus laid the planks in the foundations for a greater association and for the greatest of all professions.

Among the noted reports of those years were: The report of the committee of ten in 1894; the report of the committee of fifteen in 1895; and the report on salaries, tenure and pensions in 1905. The printed volumes of the annual proceedings of the association are full of carefully prepared addresses on topics fundamental and philosophical constituting a valuable source of information for students and scholars. Likewise the SCHOOL BOARD JOURNAL of those years bears evidence of the importance of what was thought out so well by great leaders.

It was during that time that the evidences of an American system of education began to appear. Before that, practically all educational philosophy and all methods and policies had been borrowed from abroad. Dr. Suzzallo sets forth in articles and addresses the American system which has been evolved and gives an estimate of its influence on methods and policies throughout the world.

Having been an active member of the National Education Association since 1890, I have seen what went into the foundations of the greater N. E. A. And as a member of the headquarters staff since 1917 and during the growth in membership from 8,000 to 216,000, I can appreciate better than most that this marvelous growth is due to the foundations laid before 1917 fully as much as to the professional spirit, loyalty, and sacrifice of present-day workers.

One of these days someone will feature in book form the life and service of those great men and women of those early years: (1) For an American system of education in harmony with the principles of democracy in government; (2) for the integration of all education and the development of the greater National Education Association.

I wish to present herewith the membership chart showing the growth of the Association since 1918. This is one of the most striking records in all history of Association achievements. The service rendered to the profession and to the schools has had a corresponding increase.

Just see those columns in the chart rising with the years at an angle of 60 degrees. Your magazine deserves great credit, Mr. Bruce, for what has gone into both the foundation and the structure rising above it. The people of this nation appreciate the JOURNAL. They appreciate you.

The Department of Superintendence—1891-1931

Sherwood D. Shankland, Executive Secretary, Department of Superintendence of the National Education Association

NOTE. The presentation of an article on the origin, rise, and achievements of the Department of Superintendence of the National Education Association in these columns is particularly appropriate at this time. The relationship between the AMERICAN SCHOOL BOARD JOURNAL and the Department of Superintendence, as far as its annual gatherings are concerned, has been somewhat intimate. These gatherings have grown from year to year until in point of attendance, and educational import, have become the greatest of their kind in the world.

It is with a justifiable pride that we note the fact that the JOURNAL proved an early factor in strengthening the annual attendance. —The Editor.

Competent leadership is needed for important undertakings. The public schools of the United States are responsible for educating twenty-five million children, taught by eight hundred thousand teachers at an annual cost of two billion dollars. Obviously this is a task demanding leadership of the highest order. Such leadership is no longer a one-man proposition. The school superintendent making his own course of study with scissors and paste pot is as much a relic of bygone days as is the plumed knight astride his charger leading a line of battle. Modern conditions are forcing a pooling of leadership in many fields, and education is no exception.

Now, more than ever before, superintendents of schools are seeking to organize the best thinking of teachers, principals, supervisors, research directors, and staff assistants. It is a common sight at any school headquarters to see selected groups at work on urgent problems of the profession. Fine as this is, the fact still remains that all of these people live and work in much the same environment and under the same local influences. Some way must be found to get a broader outlook.

The teachers' associations of the various states have gone a long way toward meeting the needs of all types of school workers for wider professional contacts. In 1930 the total membership of state associations was over six hundred thousand. These great associations are now well organized with able executives in charge. Forty years ago the typical state association was a feeble organization with an annual convention as its principal activity. Only a small fraction of the teachers in the state belonged to the association or attended the convention. In 1930 several state associations found it necessary to hold their meetings by districts with capacity crowds at every gathering. An all-year service is now the regular procedure for state associations, with a state journal to keep members informed of what is being done, and a membership roll including most of the teachers in the state.

A Unifying Force

Even a state, however, is too small a unit to provide educational leadership for our advancing civilization. Since 1857 the National Education Association has been a unifying force in the development of American education. From small beginnings has come a mighty organization, with a present enrollment of 216,188 members. Through the Journal and the Research Bulletins of the National Education Association, supplemented by much personal contact on the part of officers and members of the headquarters staff, the association is intimately in touch with education throughout the nation. The association has recently completed a handsome new seven-story brick building in Washington, where an expert staff, which regularly includes over one hundred persons, is constantly at the service of the teaching profession.

The National Association of School Superintendents was organized during the session of the National Teachers Association at Harrisburg, Pa., in August, 1865. The first regular meeting was held in Washington, D. C., February, 1866. It became the Department of Superintendence of the National Education Association at a convention held in Cleveland, Ohio, August 15–19, 1870. In its early years the principal function of the Department of Superintendence was to maintain its annual convention. The keenest minds in the profession assembled at these meetings. The numbers were not great, and most of those who attended could be housed in one headquarters hotel. Nevertheless, American education was profoundly affected by what was said and done.

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Forty Years in School Administration

William George Bruce, Editor, School Board Journal

The machinery employed in the administration of the public schools of the United States 40 years ago was not in its general construction, or underlying theory, much different from what it is now. There was a school board, a superintendent, and a corps of teachers. But, the functions of the several factors, and the relationships which guided them since, have undergone a decided change.

The scope of school-board labors, for instance, contemplated immediate control and direct action in all school business, including the professional services of a school system. The appointment of teachers, the adoption of textbooks, and the formulation of courses of study came within the prerogatives of the school-board member. The superintendent was subject to the whims and caprices of the laymen who had placed him in office. His authority was circumscribed, and in many instances, did not rise above that of a clerical worker.

The evils which grew out of this conception of the school-administrative service were many and perplexing. The selection of teachers was based upon favoritism rather than merit. The school-board member had friends who must be placed upon the payroll. The teacher thus placed was answerable to a layman and not to a responsible educational head of the school system. She could defy the superintendent or the principal. She held a political rather than a professional relationship to the school.

Thus, an untutored girl frequently found herself in the position of a teacher, and a superannuated or incompetent woman was retained, if she enjoyed the support of an influential school-board member. The mental, moral, and physical welfare of the school child frequently remained a matter of secondary consideration.

Meddling With Textbook Adoptions

The old-time practice in the matter of textbook adoptions led to many disturbances and scandals. When the selection of books was kept within the province of the school-board member, it was only natural that the representatives of the educational publishing houses would direct their efforts accordingly.

The adoption of a textbook for use in the schools hinged upon a majority vote in the school board, rather than upon the educational and pedagogical merits of the product seeking recognition. An adroit bookman could readily demonstrate with some degree of eloquence and plausibility the merits of his own product, and expose the demerits of his competitor's books. The board member who championed this or that book was thus equipped with a smattering of arguments to sustain his choice and record his vote. The relative desirability, or let us say suitability, of a given textbook became, in the commercial scramble for an adoption, an obscure consideration.

To score the educational publishers of the day for the methods employed in selling schoolbooks would hardly cover the case. If the method was wrong, it was because the school authorities made it thus, and did not change it. That the selection of a schoolbook was a professional task and not that of an uninformed layman was evident. That considerations other than the intrinsic value of a text, determined its selection was also apparent. That avenues for corruption were frequently opened was not a matter of doubt. The system deserved condemnation.

Administration Methods Simple

The selection of teachers by school-board members and the adoption of textbooks by laymen are indicative of the rather simple and somewhat direct plans of administration prevalent 40 years ago. The general financing of the schools was equally simple. In most municipalities, there was no distinct understanding of education as a state function; the schools were practically a part of the municipal government. In many cities, the aldermen or the mayors appointed the school directors; the city councils passed on the appropriations and the rather simple estimates of expenditures which passed as budgets; new school buildings were municipal rather than school-district projects. It should not be concluded that the conduct of the schools was generally bad — it was quite generally better than the municipal administration of its day. School-board members then as now included some of the best men and citizens. There was a distinct feeling in many communities that the schools should be protected from political evils and spoils. The germ from which developed the present happy situation of the school administration in most cities, was then already alive.

Two Lines of Improvement

In tracing the improvement of city-school administration during the past 40 years, it is possible to distinguish two general lines of advance. First, there has been a gradual but certain divorce of the schools from the municipality. The struggle has been entirely in the direction of independence of the schools from interference with financial matters and internal control. It has been largely a matter of simply recognizing the schools as an agency of the state, and of setting up the educational welfare of the children as the controlling factor of administrative policy.

Parallel with the growing independence of the school boards there has come an internal transformation in the school administration — a change in some of the functions of the board and of its executives. It was in the nineties that those who recognized that the business and professional functions of a school system were in a state of chaos, began to seek the remedy. Clearly, there must be some sort of division between the two. At least the meddling of the lay factors in matters that were wholly professional was illogical.

The member of a school board, be he merchant or manufacturer, lawyer or physician, engineer or mechanic, is not competent to judge the professional fitness of the teacher. Nor is he best suited to judge the merits of a textbook, or the contents of a curriculum.

The erroneous approach to the scope and function of a school-board member was a natural remainder of pioneer conditions and had its basis in the notion that the school board must primarily observe the rule of democracy. It resented the idea of delegating authority. If the board represented the people in the management of the schools, it must manage them and allow no mere schoolmaster to interfere with that task. The school board was either a man or a mouse.

Some Early Debates

The writer recalls some of the debates of that day. At state gatherings of board-of-education members, the prerogatives of these bodies in matters of a professional nature were vigorously defended. If the school board is responsible to the public for the efficiency of the schools, it must have a direct hand in the selection of teachers, the adoption of textbooks, and the formation of a course of study. A school board is primarily chosen to run the schools, and it must run them.

But, the fallacy of this conception also became apparent. The outstanding educators of 40 years ago began to argue against this mode of school-administrative procedure. Such men as William T. Harris, Nicholas Murray Butler, F. Louis Soldan, Albert G. Lane, Henry Sabin, Nathan C. Schaeffer, O. T. Corson, A. B. Poland, Irwin Shepard, James M. Greenwood, John W. Cook, and others, argued for reform.

The desired change did not come readily. The school superintendent, who insisted upon a new order of things, was bound to encounter trouble. The school-board member was not inclined to surrender his prerogatives. Besides, there was no law or rule which compelled him to do so. The superintendent owed his appointment to the school board and, therefore, could not compel that body to confer greater authority upon him.

After all, the battle must be won by the use of correct principles and the application of experience, rather than compulsion. And here the rift in the sky came through the business men identified with boards of education. They found in the corporations in which they were interested that the board of directors necessarily delegated authority to managers and superintendents. Such officials were clothed with a reasonable amount of authority and then held strictly responsible for results.

Here and there the individual board member awakened to the conviction that he possessed no particular training to decide on matters of a purely educational character. He believed that, if he gave time, thought, and effort to the administrative duties involving policies, and to legislative and judicial action, he complied with all the duties that could be exacted of him.

Besides, he found in time that he did not want to be harassed by applicants for teaching positions, or solicited by salesmen in the matter of supply purchases and textbook adoptions, or worried by disciplinary squabbles over pupils between parents and teachers. While he wanted to be informed fully about the progress made in the schools, he did not want to be harassed with details that did not strictly come within his province.

Reconstruction of School Administration

The board of education of 40 years ago, and for many years thereafter, was a cumbersome affair. There was, as a rule, an unnecessarily large membership. The larger and medium-sized cities had a membership that ran all the way from 20 to 50 members. We recall a Pennsylvania city of 50,000 population whose school board numbered over 60 members.

The wisdom of reducing the number of board members gradually came into recognition. The larger communities held to the appointive system, while the smaller adhered to the elective. Ward and district representation gave way to representation at large. The board member thereby learned to serve the entire community as one unit, rather than to champion a given neighborhood or a ward, to the detriment of the whole. Many of the evils, such as the location of buildings, and the unequal distribution of the school service, were thus obviated.

Nonpartisan Elections

The tenure of school-board members, too, has undergone some modification. Short terms rather than long terms were the order of a former day. The fact that a citizen must serve a year or two before he has familiarized himself with the school system and the duties of his office, gradually became apparent. The tenure, or rather the time for which the member was

appointed or elected, was also so arranged that the expirations would not all culminate at any one time.

Elections at times other than state or municipal elections when partisanship feeling ran high, were gradually found to permit the election of men and women on the basis of personal merit and interest in education. The expediency of the holdover members, from an old to a new administration, was observed.

Thus, the process of clarification has continued, until today there is a common understanding as to the scope and function of the board of education, the prerogatives of the school superintendent, and the relations that must govern the several factors of a school system. The advance thus made eliminates much of the friction and contention of a former day, makes for greater harmony and expedition in the school service, and finally for greater all-round efficiency in guiding the administrative labors, and in raising the standards of the schools.

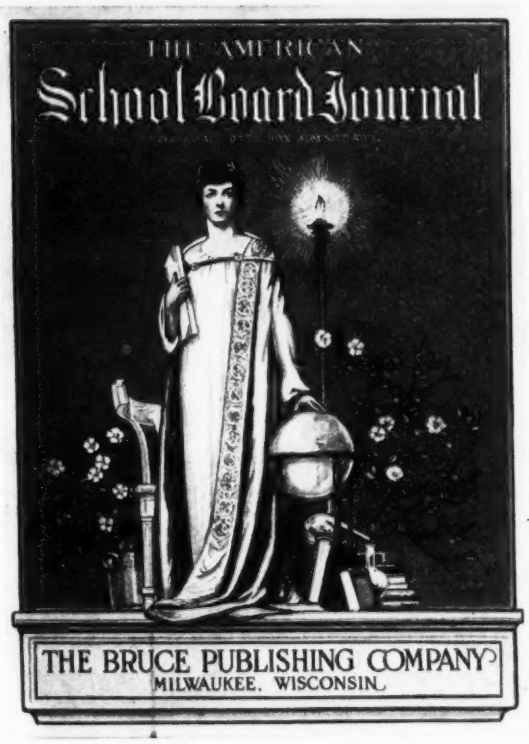
Democracy Has Not Suffered

Nor, has the principle of democracy or true representative government suffered in the process. With the growing recognition of the superintendent as the chief executive of the school system, it is always the board of education which has the approval or veto of every important act, which ultimately and in a very personal way, is responsible for educational policies and for the fundamental philosophy of the education offered. It is the board which holds the purse strings and is responsible to the community and the state.

That the administrative machinery is susceptible to further improvements and refinements, to the end that the school system as a whole may reach still higher levels of service, must readily be admitted. It is true, nevertheless, that tremendous strides have been made during the past 40 years, and that the administration of the nation's schools have never been upon a sounder or firmer basis.

The men and women who serve on the board of education today are, in the main, a reflex of the best type of American citizenship. They not only manifest an appreciation of the mission of the school, but they also possess a grasp of the relationship they bear to the sacred duty intrusted to them. The same enterprise, energy, and constructive ability which goes into the nation's commerce, industry, and finance, also goes into the administration of its system of popular education.

The efficiency which characterizes the modern board of education finds its best expression in the judicious disposition of school business and finance, in the raising of the professional standards of service, in the growth and enrichment of educational ideals, in the adaptation of



COVER OF 25TH ANNIVERSARY ISSUE

teaching methods, and instructional materials to these ideals, and in the sane and sensible policies which govern the average unit of school government.

It is finally the responsibility of school boards that the progress of the past 40 years shall be only a shadow of the growing efficiency of education in the years to come. The basic philosophy of our school system has not changed materially even though the curriculum has been enormously broadened and enriched. Vocational education, the coming of the junior high school, the broadened scope of the senior high school, the introduction of the junior college as a part of the common-school system, represents ideas and ideals not thought of or not clearly seen 40 years ago. In materials and methods of instruction, the vast contributions of educational philosophers and research specialists have caused revolution after revolution in the practical content of the instructional material, in its form and method of presentation. The school is more than ever child centered, more than ever progressive in a broad way, more than ever receptive to new ideas. With all our progress there is still room for improvement, still a fundamental need to achieve the original purpose of the founders of the Republic so that "knowledge, religion, and morality" may be part of the heritage of every child. To realize this in the future will be the duty of the school boards.

RADIO EDUCATION

E. D. Jarvis, Fort Recovery, Ohio

IV—Preliminary Preparation for the Broadcast

A. Preliminary Planning

It is assumed that we now have the ideal situation of a school equipped for the reception of radio lessons, the desired type of program available on a regular schedule and coming from a station easily received, and that the community in which the school is located is receptive to the idea of using radio broadcasts in the school. There now remains a problem of very great importance to be solved. The administrative head of the school must prepare his teachers for the use of this tool.

1. Campaign of Teacher Preparation

While we are justified in believing that a majority of teachers have come to respect the radio as an integral part of educational method, there are many who are not convinced of its value. Certainly there are large numbers who are not able to use the radio lesson wisely. It becomes necessary for the teachers, then, to be instructed in the use of the radio lesson and also for considerable numbers to be convinced of its value as a device.

One of the factors determining the success of the use of the radio is the attitude adopted by the administrator himself. In the average school system there is an undercurrent of understanding between the principal or superintendent and his teachers. We may naturally expect the administrator's attitudes to be reflected, to a certain extent, in the teachers. The administrator who believes in using only the essay type of examination, militaristic discipline, corporal punishment, and older methods, will usually have a corps of teachers of the same mind.

So it becomes necessary, first of all, that the administrator be enthusiastic in his endorsement of the use of the radio lessons. It is not sufficient that he consider them in the form of an experiment and open up his school to their use on a temporary basis. It is true that he should be open-minded and deliberative in this, as in all other problems with which he is confronted. Should the radio prove ineffective after a careful trial over a period of time, then it becomes his professional duty to discard it. However, his attitude must be one of expected success — his enthusiasm, vital and far-reaching. A freight engine, in starting its long train of cars, makes the first attempt an energetic one — it seems that the first car's coupling must be broken with the force of the motion, but if you were at the extreme opposite end, it is quite possible that the caboose was not jerked at all. The first force was used up in overcoming inertia. Nor does the engineer stop his engine after the cars have begun to move, but taking advantage of this motion, opens the throttle wider and wider until the whole train is moving along smoothly and rapidly toward its next station. Just so the administrator's initial attempt must be strong. He must overcome that most senile of all brakes upon progress — inertia. Once this inertia has been overcome, however, he cannot expect to close the throttle of his energy and begin on some other project. It will take his continued guidance and everpresent enthusiasm to keep this work progressing.

The administrator should acquaint himself thoroughly with the objectives of this type of instruction and especially those objectives which apply to his own school situation. He should know what local uses he expects to make of the equipment other than the use of receiving the regularly broadcast lessons. He should be prepared to meet objections from a professional viewpoint, likely to arise from teachers or public. His plans should be well laid before the matter is broached to the faculty. He must be prepared to say who may listen most effectively — which programs will serve the local needs in the largest way, how the programs should be received and used, and what general plan is to be followed in scheduling the broadcasting. All of these plans will be laid, but the wise administrator will guide his teachers in the selection of plans, rather than superimposing the plans upon the teachers.

The next problem to be confronted is: How shall the administrator tackle the task of educating his faculty in the proper use of the radio lesson?

Probably the first step, by way of introduction, will be a meeting of the teachers to hear typical broadcast lessons. This should be a meeting of all teachers if possible. An attempt should be made to secure some time when the pupils are dismissed and teachers are free at the scheduled time of the broadcasts. If this cannot be done, then plan for each teacher, in some way, to hear a broadcast in his or her particular subject. This should be for the purpose of showing the teachers, who have never used or perhaps never heard a radio lesson, just what they are like.

After this has been done, the administrator should plan a series of three meetings or more to be held within a month's time. These meetings may well cover four topics: first, the purposes of the radio lessons; second, preparations for radio lessons; third, the use of radio lessons; and fourth, what to do after the broadcast. It may be wise to assign the topics for discussion in these meetings to teachers who have shown efficiency and ingenuity in other ways, such as work toward project methods, etc. It will be this type of teacher, always on the lookout for methods of making the instruction more valuable and far-reaching, who will have the best success with the radio. In these meetings time should be left for discussion, for it will be from

(Continued on Page 136)

THE AMERICAN
School Board Journal
EDITORS:
WM. GEO. BRUCE WM. C. BRUCE

Forty Years of School Administration

WITH this number of THE AMERICAN SCHOOL BOARD JOURNAL the publication enters upon the fortieth year of its existence. The founder of the publication is afforded the privilege to write this editorial and to contribute something to the columns of this number.

In reaching this anniversary there is, of course, the tendency to look back over the lapse of time and form some estimate of the service that has been rendered. That the JOURNAL has been a factor in the school-administrative service of the nation must be conceded. That it has reached a place in the hearts and minds of the great school public has been asserted. These things may be said without exceeding the bounds of becoming modesty.

In noting the fortieth anniversary of a publication we do not aim to exalt either person or enterprise, but rather to regard the occasion as a milestone in the annals of American school administration. It affords an opportunity to compare the present with the past and to weigh and measure some of the achievements that have been made.

If it may be contended that the JOURNAL has made a contribution to the educational progress of its time, such contention must be proved by the educational literature of a modern day. This literature, particularly that dealing with the subject of school administration, is replete with the evidence of a service rendered.

Various bibliographies note the contribution of many hundreds of studies on the government and management of schools. No agency or institution has produced and published more discussions and articles dealing with several phases of school-administrative effort than has the JOURNAL.

The compensation which comes to the writer is not in the nature of any material success he may have achieved for himself and his associates, but rather in the consciousness that at least a sincere effort in the direction of service was made, and that the value of that service must be judged by others rather than himself. The fact that during the past forty years there has been a tremendous progress in the field of school administration and that we may have contributed our share, no matter how slight, is a source of satisfaction to us.

It is in this sense, that we review our work for the past years. The ambition to serve which has guided the Bruce interests for these years will be continued in the future. If a measure of success has attended our efforts in the past, we also have the assurance that such efforts will enlist the good will and support of the school world in the future. At any rate, we rededicate our efforts and our ambitions to the great cause of education, to the end that it may enhance the power and happiness of the great Republic, and contribute to the true destiny of its citizens.

Some Considerations in Superintendency Changes

THERE is one phase in the matter of superintendency changes which has not had the attention it deserves. It deals with removals rather than selections. It is this: That a superintendent may be unsuited for one community and quite acceptable to another. He may be a failure in the one, and a success in the other. Such failure may not be due to any shortcomings on his part, but rather to a combination of unfortunate circumstances. Where these arise the superintendent becomes quite impossible and a change inevitable.

We are agreed that a situation in which political considerations control, and where professional merit is ignored, cannot be condemned too severely. We are not so certain, however, that any injustice done to a school superintendent in one community is properly understood in the other. An enforced retirement usually entails a loss of prestige. This ought not in every instance to be so.

The unpleasant experiences which the superintendent has encountered in one community — let us call them lessons — may prove profitable in the next. Local situations vary just as the temperament of men and communities vary. The summary removal of William McAndrew of Chicago, of E. U. Graff in Indianapolis, and more recently of Homer P. Shepherd of Knoxville, from their school superintendency posts in nowise argues that they cannot serve with distinction elsewhere. While there may be foul weather in one town, there may be a fair sky in the other.

In most instances where changes are made it happens that the initiative is taken by the superintendent and not by the board of education. The superintendent may resign in order to accept a more promising post of duty elsewhere. In such instances there are no embarrassments except the regrets entertained by the local school constituency.

The real embarrassment arises when a superintendent is forced out of his position. The considerate board of education may have some regard for the professional future of the superintendent by granting ample time in which to submit his resignation. There are boards of education, however, that go at things more directly by simply announcing that the contract which expires on a given date will not be renewed.

To condemn this method wherever it is employed, without knowing the history of things, as well as the inside story, would be going too far. But the fact that peremptory changes are effected without bringing the true inside story to the surface leads to surmises and suspicions. And yet such action may be engaged in good faith. Somebody wants to avoid harmful publicity, or an embarrassing aftermath. Somebody is avoiding the truth. Intrigue, employed for political or personal reasons, may be at the bottom of things. The victim may know all about it. Others may know. And yet who cares to make a bad situation worse? Public hearings, trials, and press publicity only intensify the irritation. In the end little or nothing is gained. The more graceful the retirement of the victim the better for his professional future.

The real point to be observed here is that the school superintendent who has been crowded out of one school system through a combination of misconceptions and misunderstandings should not be regarded as an ineligible candidate for another opening. A superintendent may lose his position without having lost his professional efficiency. The temporary loss of prestige should not be marked up against him.

Interference with the School-Administrative Service

THE relations between the boards of education and the city councils on matters of school finance have in recent years reached adjustment and understandings which make for equity and fairness. Where a city council, voting on school budgets, has attempted to dictate how the funds shall be expended, the courts have taken the opposite viewpoint. A city council may determine how much money *shall* be expended for school purposes, but it is entirely within the province of the board of education to determine how the money *is* to be expended.

There are, however, some antiquated notions and usages which obtain in some states and which hinder rather than promote the school-administrative service of some of the larger cities. In some of the New England states, for instance, the local mayor is by virtue of his office an ex officio member of the board of education.

Ordinarily, it would seem to be of some advantage in having the chief executive of the city service as a connecting link between the municipality and the local school system. But, somehow the arrangement does not work out, either in the interest of the school system or the community as a whole. The city mayor, as a rule, is a political factor who watches the trend of public opinion and who spreads his political sails to catch the popular winds.

Every little while there is an eruption in one of these cities where the board of education is afflicted with a mayoralty appendage. Recently the mayor of Waltham, Massachusetts, staged a sensational row. Some minor shortcomings which occur in every school system in the land were dignified by him into formal charges which he filed with the board of education calling for a public investigation.

The board of education, blessed with a sense of proportion and fitness, as well as a sense of humor, threw the charges into the waste basket. All the trouble was caused over a statement made by a school

principal that, at the opening of the schools last autumn, the supply of school materials and paraphernalia was not ample enough. But the mayor had given his charges a sensational setting, with the result that columns of newspaper ink was wasted and an unnecessary hubbub was raised. It proved a tempest in a teakettle.

A more humiliating situation, however, is encountered in Washington, D. C., where the board of education of the Capital city must abide by the dictates of the members of the National Congress. Periodically the members of the district committee, or a subcommittee thereof, get on a rampage and want to know why things are as they are. A Congressman from Nebraska and another from Mississippi, and still another from Illinois, know exactly what is the matter with the schools of the District of Columbia. They have given ear to some of the local school teachers regarding the making out of reports and consequently are well informed. Dr. Frank W. Ballou, superintendent of schools, and President Charles F. Carusi, of the board of education, are called on the carpet and catechized like schoolboys. Note this extract from the hearing:

Congressman: I wonder if we could cut out a few reports.
Superintendent Ballou: I would abide by the decision of any person competent to judge the worth of reports required of teachers.
Congressman: Then you eliminate this committee.
Superintendent Ballou: If this committee will take the time —
Another Congressman: Then you also eliminate the teachers who make reports.
Superintendent Ballou: Yes, sir!
Congressman: Then it gets to the point where you and your staff are the only ones competent to judge!
Another Congressman: To boil down what you really believe, it is that the function of Congress is to make the appropriations and to have nothing whatever to do with laying down the policy for the administration of the appropriation.

In brief, the members of Congress hold to the doctrine that school support implies school control. City councils have long ago surrendered that doctrine. They are fully conscious of the fact that the superintendent of schools knows more about running the schools than do the local aldermen.

But, the National Congress is a law unto itself. The Congressmen from Nebraska, Mississippi, and Illinois can tell even so distinguished an educator as Dr. Frank W. Ballou where to get off at when it comes to running the schools of the Capital city.

It is indeed humiliating for an American citizenship to note that the fundamentals of school administration, now universally recognized in the nation's leading cities, are so grossly misunderstood at the seat of the national government. True, Congress makes appropriations for the maintenance of Washington's schools, but it does not follow that a Congressional committee knows how the schools should be managed. With an acknowledged educational expert of the Dr. Ballou type at the head of the school system, and with a board of education made up of high-minded citizens, comes also the assurance that the schools of Washington are in excellent hands. It does not follow that, if Congress appropriates the money for the schools, it is also competent to run them. Let Congress tend to its own knitting, and let those professionally trained run the schools.

The Waste in School Architecture

THERE was a time in the history of American school architecture when the operation of a school was fitted into the housing provided, rather than to fit the housing to the operation of the school. The architect secured his contract by presenting a highly colored perspective, rather than a series of well-devised floor plans.

The result was that clumsy turrets and towers, high roofs, and bulging bay windows — anything to attract the human eye — was advanced as a selling argument for a set of schoolhouse plans. The towers and roofs in time proved expensive from a repair point of view, and the bay windows proved a superfluous innovation. That type of architecture proved expensive and wasteful both in point of construction and building maintenance.

Well, that day has gone by. The planning of a schoolhouse no longer has its beginning with the architect. It begins with those who operate the plant. The educational specialist who understands exactly what the school expects to do, also knows the kind of structure that is required. He approaches the subject from the inner housekeeping side, and rears the housing around the activities of teacher and pupil.

While the achievements in the field of American school architecture are splendid, and have in nowise been duplicated anywhere else in the world, it would be folly to claim that perfection had been reached. The schoolhouse of the future will note departures from certain standards and come closer toward enabling the school to carry out its function more expeditiously and efficiently.

Some of the surveys conducted by specialists in recent years bring to the surface the fact that the size of structures and their location has not always been wisely determined. In growing communities the location of a new school structure involves considerations which extend into the future. The area and direction of growth of the school population, as well as the ratio and momentum of growth, become factors that must be dealt with.

Dr. N. L. Engelhardt, the eminent schoolhouse expert, recently pointed out that the future will demand a type of school buildings different from those of the past, and that standardization in the main is a mistake. The many considerations which are involved in the kind of schools to be conducted, environment, location, population, trend, and the like necessarily exclude the dress-pattern type of school plans.

Dr. Engelhardt also calls attention to the fact that the problem of city planning interlocks with public schools on three major points. "First, city plans must be considered by school officials to prevent destructive loss from the selection of inadequate school sites; second, recreational problems are so interrelated with educational programs that for both adults and children school officials must coöperate with the planning commission and, third, the schools must share in the education of the public to the appreciation of the significance of a well-developed city plan."

The Board of Education as a Target

EVERY community has its coterie of men and women who know exactly how public affairs should be conducted, and who do not hesitate to express themselves promiscuously and vociferously. The local board of education does not escape these talkative busybodies. The criticisms range all the way from the whisperings of a backyard confab to the open flare of a sensational newspaper story.

The average board of education, exposed to unfriendly gossips, usually travels along complacently placing a proper estimate upon all that is said. The tendency to give courteous heed to gossips and attacks usually lead to controversy. Where it is ignored criticism usually fades into thin air.

Occasionally school officials are driven to the point where patience and courtesy no longer serve their purpose. Gilbert Brach, chairman of the finance committee of the board of education of Racine, Wis., in an outburst of impatience gave voice to the following:

"The school board is no longer going to be the political football for men who, to further their own interests, delight in maligning and slandering honest endeavor. The board shall resent it militantly, and let the question that arises stand or fall before the public upon its merits. The board wishes to serve notice upon its cynical critics that from now on it shall not lend an ear to criticism unless it is constructive."

Such an outburst of righteous indignation, uttered under circumstances and at a time when things become unbearable, has its calming and beneficent influences. The man who is challenged to come forward with something that is constructive, sound, and reasonable, frequently goes into hiding.

In mentioning some of the irritating circumstances which arise in the field of school administration it is gratifying, on the other hand, to note that occasionally someone expresses appreciation. The editor of the *Press,* Elmhurst, Ill., for instance, recently rose and put a damper on unreasonable criticism in the following pacifying language:

"School-board members are folks who serve their community with full recognition of the duties of citizenship, but who too often receive not a word of thanks for their efforts. Month after month they have their routine business sessions and conduct the manifold problems of administering the affairs of running an educational system, providing adequate building space, getting bills paid within discount periods, and settling countless problems that always arise. Their's is the responsibility for the education of our children. When school systems are well organized, function smoothly, and serve their purpose well, members of the board are entitled to their just share of the credit."

The real troublemaker is he who prefers to rush into print with his grievances instead of bringing them to the proper authorities in an orderly manner. A progressive board of education invites rather than rejects friendly, helpful, and constructive criticism.

Bond Interest Rates Trend Lower[1]

Harold F. Clark, Ph. D., New York

Bond interest rates have again started downward and barring some unfortunate developments in the general financial situation the trend should be toward still lower prices. In the comments on bond prices last month, reference was made to the panic situation that developed around the middle of December. By an unusual combination of circumstances a somewhat similar situation developed during the last week in January. Bond interest rates had been steadily falling throughout the month of January and gave every promise of reaching very satisfactory levels.

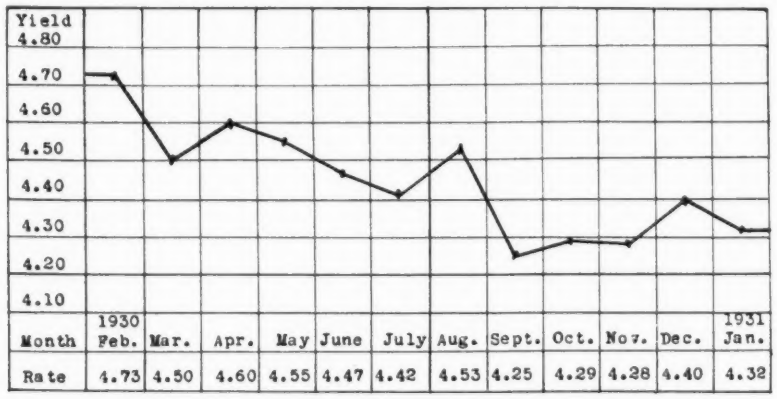


TABLE I. AVERAGE PRICE OF ALL SCHOOL BONDS SOLD DURING THE MONTH

All at once discussion arose in Congress regarding a very large bond issue to pay off the soldiers' bonus. The prospect of the bond market having to absorb between three and four billion dollars in bonds immediately led to a drastic fall in bond prices. When we realize the bond issue under discussion was larger than the entire amount of school bonds outstanding in the entire United States, we can readily realize what could happen to the bond market. To add to the confusion, various rumors were circulating regarding the rate of interest the government would pay on the new bond issue. If the new issue was to carry a rate of 4¼ per cent or 4½ per cent all government bonds outstanding would, of course, have to decline in value until they reach this yield. In the process of this decline all other bonds would be carried down.

TABLE II. Amount and Yield of Bond Issues

1. School bonds during the month[1] of December..	$ 8,241,000
2. All municipal securities sold during the year (to date)	49,125,000
3. All school bonds outstanding (estimated)	3,262,000,000
4. Average yield of all school bonds outstanding (estimated)	4.63%
5. Yield of school bonds of ten large cities	4.21%
6. Yield of United States long-term bonds (Quotation the middle of February)	3.15%

[1]The monthly total of school bonds does not include all the bonds issued in the month, due to the difficulty of obtaining the yield on some of the issues.

The situation during the last week in January was anything but satisfactory from the standpoint of the immediate future of bond prices. Any school district that had been contemplating selling bonds the first of February would have been in an unenviable situation unless they could immediately postpone the sale. By the second week in February the wildest of the rumors had passed away and the bond market was beginning to take on some order again. Prices were rapidly rising and the worst of the situation seemed to be over. The general opinion seemed to be that some settlement fair to the soldiers and not too disturbing to the bond market could be reached. We have no desire to intimate that the large bond issue should not have been passed. Our entire purpose is to call attention to the extreme suddenness with which factors modify the success of a school-bond sale. A school board may have all of its plans adjusted and the sale set for a time that seems to be very advantageous when suddenly a new factor will appear upon the situation. Any school board that is interested in getting the maximum for the public's money, will be wide-awake to every development that occurs in the bond market whether it can be foreseen or whether it arises without warning. If it is at all possible, provision should be inserted in announcements of sale that the entire issue may be postponed under certain circumstances. Certainly any school board would have been thoroughly justified in postponing a bond issue during the last few days of January or the first few days of February. In fact, any issue that was not so postponed was deliberately wasting the public's money.

TABLE III. Bond Sales and Rates[1]

Year	*School*	*Municipal*	*All Public and Private*	*Year*	*Municipal*
1929	230*	1,432*	10,194*	1929	4.67*
1928	218	1,414	8,050	1928	4.45
1927	266	1,509	7,776	1927	4.49
1926	260	1,365	6,344	1926	4.61
1925	323	1,399	6,223	1925	4.58
1924	288	1,398	5,593	1924	4.26
1923	206	1,063	4,303	1923	4.76
1922	237	1,101	4,313	1922	4.81
1921	215	1,208	3,576	1921	5.18
1920	130	683	3,634	1920	5.12
1919	103	691	3,588	1919	5.04
1918	41	296	14,368	1918	4.90
1917	60	451	9,984	1917	4.58
1916	70	457	5,032	1916	4.18
1915	81	498	5,275	1915	4.58
1914	42	320	2,400	1914	4.38

[1]By special permission based upon sales reported by the Commercial and Financial Chronicle.
*Not final.

[1]Copyright by Harold F. Clark.

Even with the unsettled condition that developed in the bond market toward the last of the month the average interest rate on all school bonds sold during the month of January was somewhat less than in December. The average rate of interest on all school bonds sold during the month of January was 4.32 per cent. This compares with the rate of 4.40 per cent during the month of December. This represents a drop of eight hundredths of 1 per cent during the month of January. That interest rate is back almost to the lowest level of recent months. If it had not been for the disturbance toward the end of January, it is quite safe to say that bond prices would have established a new low record in interest rate for the current decline.

TABLE IV. Average Yield of Long-Term Federal Government Bonds[1]

Month	*Rate*	*Year*	*Rate %*
1931		1928	3.437
Feb.	3.31*	1927	3.464
Jan.	3.32*	1926	3.544
1930		1925	3.797
Dec.	3.34	1924	4.010
Nov.	3.32	1923	4.298
Oct.	3.34	1922	4.301
Sept.	3.37		
Aug.	3.38		
July	3.37		
June	3.37		
May	3.41		
April	3.46		
March	3.40		

[1]Taken from Federal Reserve Bulletin.
*Not final.

The phenomenally low interest rates on money in general should sooner or later affect interest rates on bonds. Interest rates on bankers' acceptances have been quoted around 1½ per cent for short maturities. Day after day, money has been available at 1 per cent on so-called outside stock-exchange collateral loans. Short-term government notes are selling to yield around 1¼ per cent to 1½ per cent. With interest rates on long-term bonds 4, 4½, and 5 per cent, the difference between long- and short-term issues is too great. Sooner or later the long-term issues will be forced to lower interest rates. One of the best authorities in New York commenting on this situation says: "The indicated spread of nearly 3 per cent between short- and long-term interest rates is the widest in many years, and under normal conditions must eventually lead to an overflow of short-term funds into the bond market." All things considered, I think it is quite safe to say that the immediate future of bond prices is very hopeful. The probabilities are that school bonds can be sold on slightly declining interest rates frequently during the next several months.

TABLE V. Security Prices and Yields[1]

Date	*Average Price of 404 Stocks (1926 Average = 100)*	*Average Price of 60 Bonds*	*Average Yield of 60 High-Grade Bonds*
1931			
Feb.	114.7*	99.8	4.42
Jan.	112.2*	99.6	4.43
1930			
Dec.	109.4	97.8	4.55
Nov.	116.7	99.1	4.46
Oct.	127.6	100.0	4.41
Sept.	148.8	100.0	4.41
Aug.	147.6	99.6	4.43
July	149.3	98.7	4.49
June	152.8	98.2	4.53
May	170.5	97.9	4.54
April	181.0	97.9	4.54
March	172.4	97.8	4.55

[1]As reported by Standard Statistics Company, Inc. Used by special permission.
*Not final.

The month of January provided some rather unusual school-bond sales. There was quite a large number of issues selling for a net interest base of less than 4 per cent. One of the low issues for the month sold for the net interest base of 3.68 per cent. As we have suggested several times in the past few months, when the first issues begin to sell under 3½ per cent, school-bond interest rates may be considered really low. This one issue was approaching close to that level. At the other side of the scale we have a surprising number of issues that were sold for more than 5 per cent and more than one sold at the net interest rate of 6 per cent.

TABLE VI. Revised Index Number of Wholesale Price
(United States Bureau of Labor Statistics. 1926 = 100)

Month	*All commodities*	*Building Materials*	*Year*	*All commodities*	*Building Material*
1931			1928	97.7	93.7
Feb.	77.1*	83.7*	1927	95.4	93.3
Jan.	77.6*	83.9*	1926	100.0	100.0
1930			1925	103.5	101.7
Dec.	78.4	84.4	1924	98.1	102.3
Nov.	80.4	85.6	1923	100.6	108.7
Oct.	82.6	85.8			
Sept.	84.2	86.4			
Aug.	84.0	87.4			
July	84.0	88.9			
June	86.8	90.0			
May	89.1	92.9			
April	90.7	94.7			
March	90.8	95.4			

*Not final.

Table IV continues to show relatively little change in the price of long-term treasury bonds.

Table V shows some slight increase in the average price of stocks from the December level. This increase was accompanied, however, by a continued decline in the amount of borrowed money for stocks. For this reason it is of no particular significance for bond prices.

Table VI provides, perhaps, the most discouraging part of our entire situation. There seems to be no evidence that the price of commodities has stabilized. The price of building materials continues to fall. This, of course, provides more favorable opportunities for building.

FINANCE AND TAXATION

The increase of the bonded debt of the school system of Cleveland, Ohio, is tabulated as follows:

Year	*Bonded Debt*	*Per Pupil*	*Per Capita*
1910.....	$ 3,091,350	$ 46.33	$ 5.46
1920.....	12,432,000	113.26	15.41
1930.....	29,198,000	201.79	31.89

In the past six years the board of education has spent $16,384,773 on new buildings and additions to old buildings. Fourteen new buildings were completed at a cost of $9,545,928, five additions were made at a cost of $2,067,845, and four new buildings are under construction at a cost of $4,046,000. Additions to be made in the rest of the year will total $725,000 for four buildings.

♦ Cheyenne, Wyo. The school board has recently refunded $340,000 worth of high-school bonds, issued in 1921, and optional in June, 1931. The bonds were resold to the state. Under the new plan, the bonds are paid off serially with the final payment in 1945, thus effecting a saving of $6,375 to the district during the first year, and with corresponding lesser amounts each year until the bonds are finally retired.

The Office and Activities of the Secondary-School Principal

The Pasadena, California, school system has recently redefined the functions of the various executive and supervisory officials of the school system. The duties of the superintendent of schools are very clearly outlined in the rules of the board of education, and it was believed desirable that a similar specific statement of the activities and duties of the high-school principals, of the grade-school principals, and of other school officials should be available.

To make the accepted practice reflect the best opinion and experience of the teaching staff as well as the administrative group, special committees, consisting of two teachers, two assistant principals, an assistant superintendent, and a supervisor were appointed. In each case the members were chosen from the schools under consideration and were asked to obtain the opinions of teachers, etc., in these schools. The following is the statement prepared by the committee concerning the secondary and elementary-school principals:

Office and Activities of the Secondary-School Principal

The office of the principal of the secondary schools exists to afford the teachers and children direction necessary to carry forward the general school program within the individual high school, and to represent the superintendent in an appropriate manner to the particular school community wherein the principal presides.

I. Functions of the Office of the Secondary-School Principal

A. *Administrative Responsibilities*

1. The principal is the superintendent's representative within the local school and is charged with the responsibility of carrying out the general policies of the administration as approved by the superintendent and the board of education.

2. The principal is held responsible for the organization and administration of the local school.

3. He shall see that all health rules, regulations, and laws are strictly enforced.

4. He shall facilitate the work of the special supervisors and directors by rendering every administrative aid possible.

5. He shall maintain office hours for conferences with teachers, patrons, and students.

6. He shall require such assistance and coöperation from other employees within his school as may be necessary in the interests of efficient administration.

7. He shall be held responsible for a definite school policy and for a building program extending as far as practicable into the future.

8. He shall maintain a proper *esprit de corps* and morale among the faculty and students.

9. He shall maintain a plant and physical equipment adequate to the educational program of the school.

10. He shall keep informed on the complete status of the school through personal inspection and reports of employees within the school.

11. He shall entertain official visitors.

12. He shall report to the superintendent on the efficiency of work done by all employees working under his supervision.

13. He shall sign and be responsible for all official reports and forms going out from the school.

B. *Supervisory Responsibilities*

1. He shall by personal visitation keep in touch with the classroom activities and other regular activities of the school.

2. Classroom visitations shall be followed by teacher conferences in which proper steps will be taken for the improvement of instruction.

3. He shall report to the superintendent concerning the fitness and merit of teachers under his supervision.

4. He shall take advantage of all opportunities for his professional growth in service and encourage his teachers to do likewise.

5. He shall be responsible for the assignment of a fair and reasonable teaching load for all teachers within his school.

C. *Responsibilities to the Students*

1. He shall see that the adopted courses of study are adhered to.

2. He shall adjust the courses of study to the students in such a way as to provide for the maximum growth and development of all students within his school.

3. He shall exercise general supervision over the extracurricular activities of the school.

D. *Responsibilities to the Community*

1. He shall assume as one of his important functions that of interpreting to the people of his community the meaning and significance of what the school is trying to do for the students and shall take such steps as are necessary to secure community support and coöperation.

II. The Relationship of the Secondary-School Principal to Other Agencies in the System

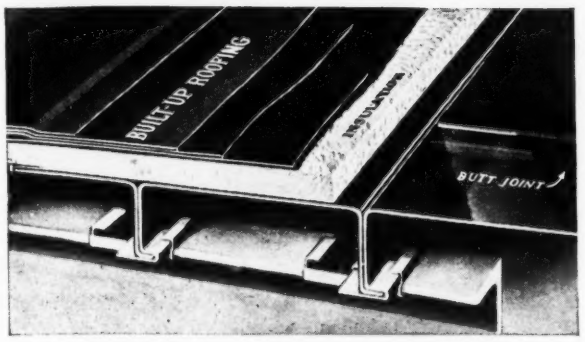
A. *To the Superintendent*

The secondary-school principal is the superintendent's representative within his particular school. He is responsible directly to the superintendent's office for carrying out the policies of the board of education and the superintendent. He shall make an annual report to the superintendent of schools and such supplementary reports as the superintendent may from time to time call for, setting forth the conditions within the school and including such other data as the superintendent of schools may request.

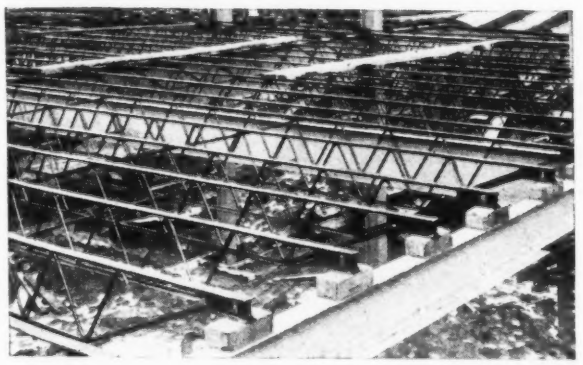
B. *To the Assistant Secondary-School Principals (Junior High Schools and John Muir Technical High School)*

(Continued on Page 70)

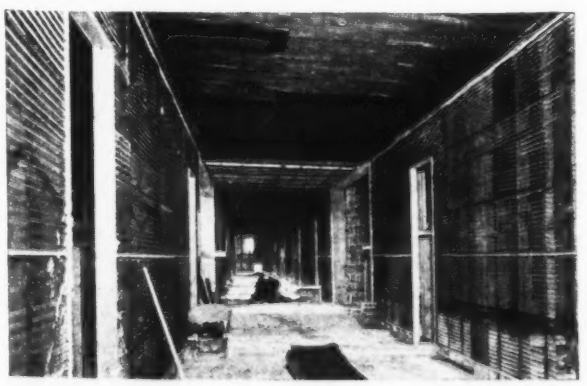
Health and Safety in Modern Schools



Steeldeck Roofs, insulated to any degree and waterproofed, make schools warmer in winter, cooler in summer, and are fireproof.



Steel Joist construction is light in weight, soundproof and fireproof. The open web permits pipes to pass in any direction.



Soundproof partitions and firesafe, crack-free permanent walls and ceilings are obtained through the use of Truscon Metal Lath.

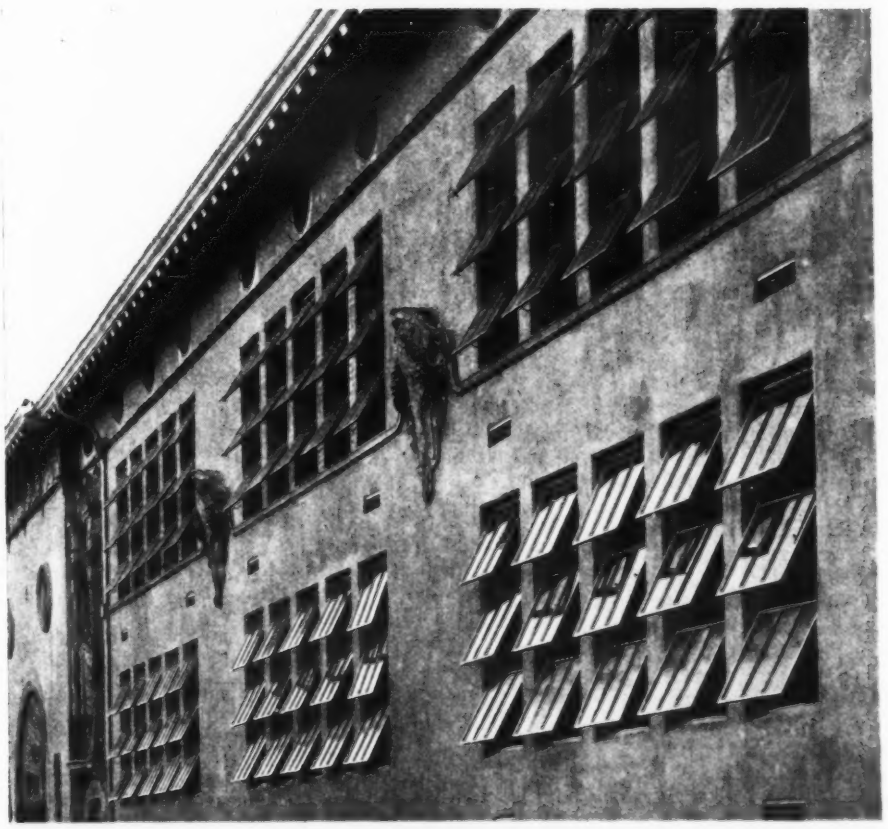
Ample daylighting and proper ventilation promote the health of school children. Truscon Windows for schools operate easily and are of finest quality. Types are available for every architectural requirement.

Protection against the fire menace must be provided in modern schools. Fireproof construction is assured with Truscon Steel Building Products, which include steel joists and reinforced concrete for floors, Steeldecks for roofs, metal lath for plastered walls and ceilings, metal door frame and trim for doors, and steel doors for furnace rooms, service entrances, etc.

The high quality of Truscon Products insures permanence and satisfaction. Their many distinctive features result in better construction at economical cost. The complete Truscon line includes products to meet every building condition.

Truscon Engineers will study your requirements and will make detailed recommendations without obligation. Write for catalogs and estimates.

TRUSCON STEEL COMPANY, YOUNGSTOWN, OHIO
Warehouses and Offices in Principal Cities
PACIFIC COAST PLANT—LOS ANGELES



Truscon Donovan Awning Type Steel Windows provide diffused sunlight without glare and natural ventilation without drafts. Shades on sash act as awnings.

TRUSCON

STEEL WINDOWS - STEEL DOORS - STEEL JOISTS - METAL LATHS - STEELDECK ROOFS - REINFORCING STEEL

(Continued from Page 68)

The secondary-school principal may delegate to the assistant secondary-school principal such particular functions as conditions within the respective schools require. He shall coöperate with the assistant secondary-school principal in the administration of the school, and the assistant secondary-school principal will be the principal's representative during the latter's absence from the plant.

C. *To the Deans (Junior College)*

The principal of the Pasadena Junior College shall coöperate with the deans in the administration of the Pasadena Junior College. He shall delegate to the deans such special functions as conditions within the junior college may require. The deans shall be coördinate in rank and shall be responsible directly to the principal for the administration of the duties of their respective offices.

D. *To the Counselors (Junior High Schools and John Muir Technical High School)*

The secondary-school principal shall coöperate with the counselors in administering the guidance program of the school. He shall delegate to the counselor such specific functions and responsibilities along this line as conditions within the respective schools may require.

E. *To the Directors and Supervisors*

The secondary-school principal shall avail himself of the expert services of the directors and supervisors of the system. It is his responsibility to make available to the department chairmen and to the teachers the counsel and supervision of these officers within their respective fields.

F. *To the Department Chairmen*

The department chairman is the principal's representative within his particular field. The principal may delegate to the department chairman such specific responsibilities as the efficient administration of the school may require. All responsibilities held by department chairmen are delegated by the principal.

G. *To the Teachers*

The secondary-school principal shall coöperate with the teachers in providing the optimum conditions for the growth and development of the students. It is his responsibility to see that the teachers have adequate working conditions and equipment and access to the expert supervision and counsel of supervisors and directors within their respective fields. The secondary-school principal shall make available to the teachers adequate supervision of the classroom procedures and shall follow up this supervision by conferences with the teachers.

H. *To the Students*

It is the duty of the secondary-school principal to make available to the students an educational experience which will provide for their maximum growth and development. He shall see to it that the advantages provided by law and by the action of the board of education are given to the students.

Office and Activities of the Elementary-School Principal

The office of the principal of the elementary school exists to afford the teachers and children direction necessary to carry forward the general school program within the individual elementary school, and to represent the superintendent in an appropriate manner to the particular community wherein the principal presides.

I. The Functions of the Office of Elementary Principal

A. *The Principal is responsible for the detailed organization and the efficient administration of all school activities.*

1. He shall be responsible for the care of buildings, equipment, and grounds.

2. He shall be responsible for the keeping of records and the making of reports.

3. He shall be responsible for the requisitioning and distributing of all needed school supplies and equipment.

4. He shall carry out the rules of the board of education.

5. He shall perform line responsibilities delegated by the superintendent or other ranking officer.

6. He shall participate in the selection of his faculty.

7. He shall assign the faculty and other personnel.

8. He shall recommend to the superintendent concerning matters which determine the legal status of teachers under his supervision.

B. *The principal is responsible for all learning activities within the school. This includes both curricular and extracurricular work.*

1. He functions in supervision by having:
   - *a*) Knowledge of child growth — physical, mental.
   - *b*) Knowledge of the processes of learning.
   - *c*) Familiarity with educational objectives.
   - *d*) Familiarity with curriculum content.
   - *e*) Knowledge of the environment within which the child lives.
   - *f*) Progressive and positive educational philosophy.
   - *g*) That approach to teachers which recognizes them as members of a profession.

2. He avails himself of the expert counsel of staff officers.

3. He sets up and directs means for evaluating progress.

4. He is responsible for the use of all recorded data in order to:
   - *a*) Interpret group and individual status.
   - *b*) Direct proper guidance.

C. *The principal is responsible for the encouragement and promotion of professional leadership in the community and in the school.*

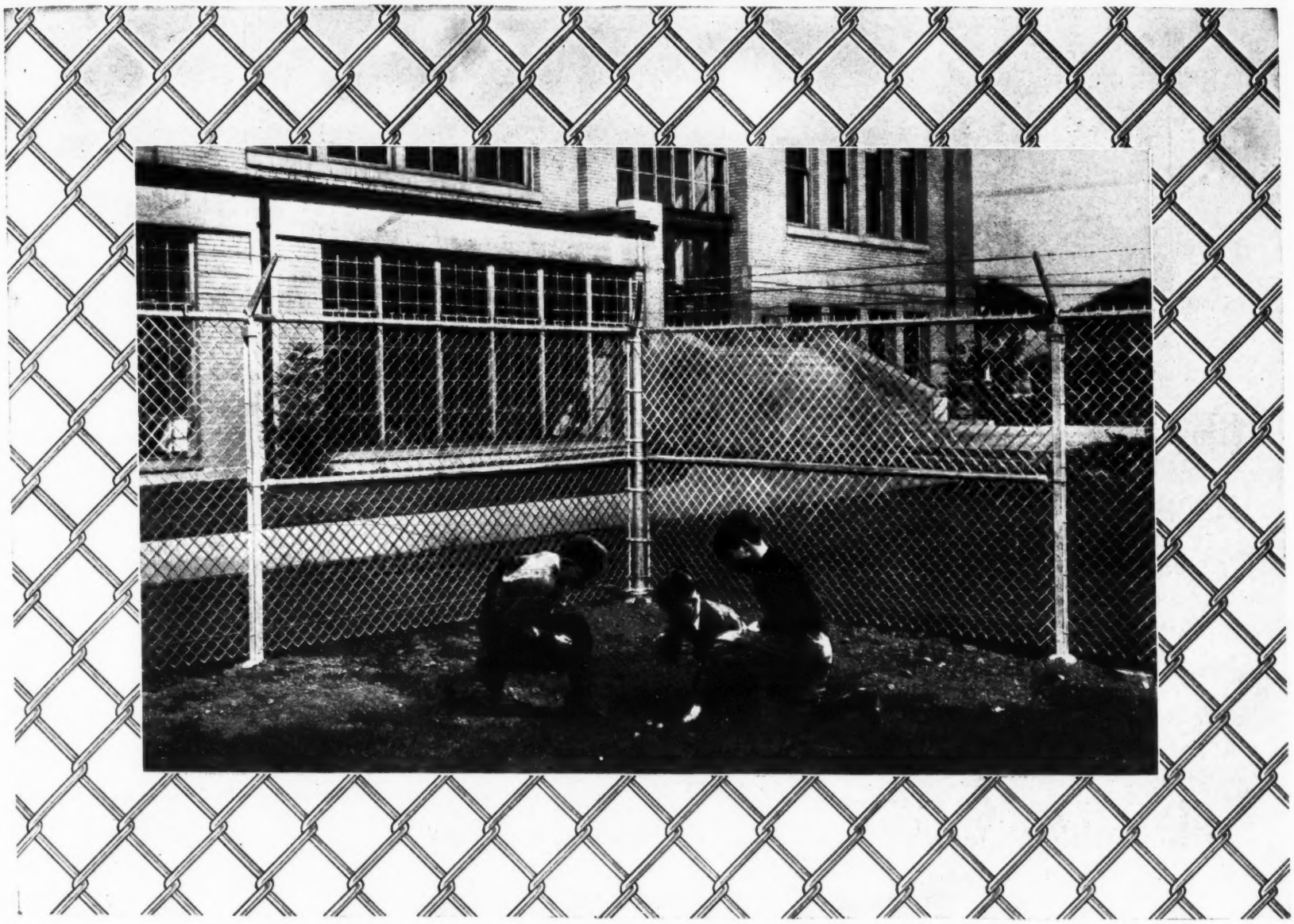
1. He inspires both faculty and pupils to integrate their efforts and thus approach in as large a measure as is possible, the accepted educational objectives.

2. He inspires the faculty by:
   - *a*) Encouraging teachers to study professional

(Concluded on Page 72)

ADULT EDUCATION

The teachers of the United States have absorbed more adult education during the last decade than has any other single class of persons. It would perhaps be safe to go farther and to venture the estimate that the teachers of this country are a majority of all the people who have continued their intellectual training beyond the period of adolescence. — Prof. Charles H. Judd.



FENCE
for Protection and Appearance

A GROUP of jolly, energetic, rollicking, playful children on the school grounds—where will you find a more irresponsible, thoughtless aggregation? It is the duty of those in authority to protect them from their own heedlessness. Traffic signs? Crossing signals? Speed laws? Safety zones? By all means, yes! But a few hundred feet of Continental Chain-Link Fence will go further and last longer in a Safety Campaign than all the warnings and advice ever given. It adds materially to the appearance of the playgrounds, too.

Continental Chain-Link Fence is the crowning achievement of thirty years' experience in fence manufacture. It is made exclusively of special "copper-bearing" steel produced in our own open hearth furnaces and drawn in our own mills, especially for fence manufacture. Every inch of it is heavily *galvanized by the hot dip process after fabrication.*

Continental Chain-Link Fence is erected by trained experts under the supervision of Continental Fence Engineers and every job is guaranteed to produce the satisfaction that inspired its purchase. Let us advise with you, study your needs, and quote prices for your complete requirements. Write us now.

CONTINENTAL STEEL CORPORATION
KOKOMO, INDIANA

Manufacturers of Billets, Rods, Wire, Barbed Wire; Farm, Poultry, Lawn and Chain-Link Fence; Black, Galvanized, Special Coated and Roofing Sheets.

(104)

CONTINENTAL
Chain-Link
FENCE

(Concluded from Page 70)

literature.

b) Encouraging teachers to study progressive educational practices, movements, and trends.

D. *The principal is responsible for the human engineering necessary in promoting a progressive philosophy of education.*

1. He furthers the continuous growth of pupils and teachers by coöperatively setting up with them a progressive educational policy.

2. He acts as the educational representative of the school to the community. He interprets the school activities to the community, and keeps the public informed of what the school is doing and what its needs are.

3. He interprets to the community the plans and policies of the superintendent and the board of education.

4. He studies the community for further opportunities to enrich the educational program.

5. As opportunity is presented, he proposes for recognition those in service whose aptitudes, preparation, or ability, indicate a personal adjustment for personal enrichment, or for increased professional service.

E. *The principal is responsible for promoting a coöperative relationship that will release to the children the maximum service.*

1. He promotes a morale in the contacts arising between pupils, teachers, and principal, which lead to natural and democratic relationships.

2. He promotes an understanding of policies and procedures of service officers and aids in promoting approved programs.

3. He promotes an understanding of the interresponsibilities of all fellow line officers.

4. He coöperates with the superintendent in obtaining and interpreting needed information, in the forming of plans, and in furthering educational progress through participation in research studies.

II. Relation of the Elementary Principal to Other Agencies

A. *To the Superintendent*

1. The principal shall perform the duties delegated to him by the superintendent who is his superior officer. He shall feel free to consult with the superintendent when necessary.

B. *To the Directors and Supervisors*

1. The principal shall recognize that the directors and supervisors are expert service agents available for his use in the improvement of instruction. The directors shall feel free to consult with the principal and to make recommendations concerning matters within their sphere of activity.

C. *To the Teachers*

1. The principal is the guide and leader of his faculty. He shall, by democratic means, recognize the important position which they hold.

D. *To the Pupils*

1. The principal shall recognize in the pupil the object for which the school exists and be to him a friend, a counselor, and a guide.

A PRACTICAL OUTLINE FOR CONDUCTING CLASSROOM SUPERVISION

In the conduct of classroom supervision every school administrator is faced with the need of a guide to aid him in his work. This guide must be brief, but complete, covering a wide variety of school subjects and activities.

Dr. John A. Nietz, assistant professor of education at the University of Pittsburgh, Pittsburgh, Pa., has devised a very practical outline to be used in the work of classroom supervision. Teachers are to be marked superior, excellent, good, fair, or poor, on each point:

I. Nature of the learning situation
  1. Control technique (discipline)
  2. Nature of class management
  3. Physical matters; as light, ventilation, etc.
  4. .....

II. Recognition of objectives to be attained
  1. Recognition by teacher
  2. Recognition by pupils
  3. .....

III. Fulfillment of the objectives through the classroom activities
  1. Recognition of such fulfillment by teacher
  2. Recognition of such fulfillment by pupils
  3. Harmonization of objectives and the activities
  4. .....

IV. Provision for individual differences
  1. In ability
  2. In interests
  3. In needs
  4. .....

V. Use of pretests
  1. Oral (for motivating)
  2. Written (for diagnosis)
  3. .....

VI. Discovery of pupil-learning difficulties
  1. Rapport
  2. By means of tests
  3. Attempts to eliminate difficulties
  4. .....

VII. Determination of pupil progress
  1. By means of progress tests
  2. By means of reteaching
  3. .....

VIII. Direction of pupil learning
  1. Use of pupil guide sheets or units
  2. Grouping of pupils
  3. Direction of study
  4. .....

IX. Opportunities for pupil reaction
  1. Floor talks
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  3. Work on supplementary exercises
  4. Pupil demonstrations
  5. .....

X. Nature of attitudes of pupils
  1. Attitude toward their work
  2. Attitude toward other pupils
  3. Attitude toward the teacher
  4. Attitude toward such social institutions as the school, home, government, etc.
  5. .....

♦ MR. W. C. FISHER has been elected president of the school board of Lorain, Ohio. Other officers elected were MR. E. G. COOPER, vice-president, and MR. ELI SMITH, clerk-treasurer.

. . . R. I. P.

Grandaddy Microbe, for years a tenant of Number 10 School, has turned up his toes to the daisies. A martyr to the cause of education. Read this tearful epitaph, penned by his bereaved "relations" who live in the crevices of the old-fashioned Town Hall floor:

GRANDADDY MICROBE

The well-trained flea
Had nothing on me
With his paltry bagful of tricks.
I got my degree
In Geometry
And Honors in mathema tics.

Though my life-time was spent
As befits a true gent
'Tis my shameful demise I bemoan,
Now my corpse you lament
And the School Board's content
With Linoleum made by Sloane.

This book will show you why floors of W. & J. Sloane Double-Waxed Linoleum are desirable. Write for free copy. Advertising Dept., W. & J. Sloane, 577 Fifth Ave., New York, N. Y.

Microbes haven't a ghost of a chance when you specify W. & J. Sloane Linoleum. Sanitary and easy to clean because of its smooth, uniform surface. Extra grinding of the ingredients, plus 32% extra pressure in the calender rolls, eliminates all cracks and crevices. Double-waxed at the plant, ready to lay. School officers and members of school boards will be interested in our comprehensive book: "Linoleum—What It Is—How It Is Made in the W.&J. Sloane Plant." We will gladly send you a copy on request. Address Advertising Department, W. & J. Sloane, 577 Fifth Avenue, New York.

W. & J. SLOANE LINOLEUM

(Concluded from Page 70)

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   4. .....

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   2. In interests
   3. In needs
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♦ Mr. W. C. Fisher has been elected president of the school board of Lorain, Ohio. Other officers elected were Mr. E. G. Cooper, vice-president, and Mr. Eli Smith, clerk-treasurer.

. . . R. I. P.

Grandaddy Microbe, for years a tenant of Number 10 School, has turned up his toes to the daisies. A martyr to the cause of education. Read this tearful epitaph, penned by his bereaved "relations" who live in the crevices of the old-fashioned Town Hall floor:

GRANDADDY MICROBE

The well-trained flea
Had nothing on me
With his paltry bagful of tricks.
I got my degree
In Geometry
And Honors in mathema tics.

Though my life-time was spent
As befits a true gent
'Tis my shameful demise I bemoan,
Now my corpse you lament
And the School Board's content
With Linoleum made by Sloane.

This book will show you why floors of W. & J. Sloane Double-Waxed Linoleum are desirable. Write for free copy. Advertising Dept., W. & J. Sloane, 577 Fifth Ave., New York, N. Y.

Microbes haven't a ghost of a chance when you specify W. & J. Sloane Linoleum. Sanitary and easy to clean because of its smooth, uniform surface. Extra grinding of the ingredients, plus 32% extra pressure in the calender rolls, eliminates all cracks and crevices. Double-waxed at the plant, ready to lay. School officers and members of school boards will be interested in our comprehensive book: "Linoleum—What It Is—How It Is Made in the W. & J. Sloane Plant." We will gladly send you a copy on request. Address Advertising Department, W. & J. Sloane, 577 Fifth Avenue, New York.

W. & J. SLOANE LINOLEUM

PLACING INSURANCE ON SCHOOL PROPERTY

Wisconsin cities do not follow any uniform standards in placing fire insurance on school property, is one of the findings of Superintendent P. M. Vincent of Stevens Point, who investigated the current practice in 48 communities. Mr. Vincent found that only 4 cities have no school insurance. Out of the 48 cities, 33 report that they divide up the insurance policies among the local agents; 6 place their insurance with the state insurance commission.

Primarily all policies call for fire insurance, while 14 also include protection from tornado losses. One school system is insured against burglary. In 11 cities this is placed on an 80-per-cent-coinsurance basis, two on a 90-per-cent basis, and one each on a 70-per-cent and 50-per-cent basis.

In placing the insurance policies the school authorities of Neenah report that the business is divided among the local agents on the basis of companies represented, length of time the agent had been doing business, the volume of business, whether or not insurance is the main business or a side issue, and on the quality and kind of service the agent is able to render the school board. Taking all these factors into consideration, the board allots the amount given to each agent.

REPORT DECREASE IN CHILDREN'S ACCIDENTS

School teachers, policemen on traffic duty near schools, and others engaged in safety work have been credited with saving the lives of 6,000 children a year, and preventing the injury of many thousands more, as a result of the statistical study recently completed by Mr. Albert W. Whitney, of the National Bureau of Casualty and Surety Underwriters of New York, and vice-president in charge of education of the National Safety Council.

The report shows that from 1922 to 1928 the increase in accidental fatalities to adults was 32 per cent; during the same period, which was the exact period during which intensive work in safety education has been carried on in the schools, the deaths of children increased for the first two years, and then steadily decreased, the net result being an increase of 1/16 of 1 per cent. If the deaths of children had increased at the same rate as that of adults, over 6,000 more children would each year be losing their lives than is now the case; in other words, over 6,000 children's lives are being saved each year.

A study of automobile fatalities among a population of over 38 million for the years 1927 to 1929, made by the National Safety Council, shows for the period, a 24-per-cent increase in the deaths of adults, a 7-per-cent increase for children of preschool age, and a 10-per-cent decrease for children of school age. The figures for New York City for this period are still more striking, the increase for adults being 35 per cent, and for children of preschool age 15 per cent, with a decrease of 24 per cent for children of school age.

Figures compiled of accidental fatalities in New York City for the years 1920 to 1929 show for adults, a steadily mounting percentage increase — that in 1929 being 60 per cent, with a steadily decreasing figure for children, a 28 per cent decrease, in 1929.

Figures from all parts of the country indicate the same general facts, that the accidental fatalities to adults are increasing, and that the accidental fatalities to children are decreasing. From the study it is clearly evident that children are learning how to accommodate themselves to the dangers of modern life.

Similar reductions in the fatality rate among adults would undoubtedly be effected, it was stated, if the same means for educating older people were available. Experiments by educators have shown that adults have approximately as good learning ability as children.

It was brought out that crossing streets at points other than crossings continue to be the chief cause of all accidents, especially to children. Other causes of accidents are stealing rides, coasting on toy wagons, roller skating, playing games in streets, running off sidewalks, and bicycle riding.

TRENDS OF SECONDARY EDUCATION

♦ A study of *Trends in Secondary Education,* published by the University of the State of New York, shows that secondary-school registration throughout the country has increased sevenfold, and that New York state enrollment has risen by more than 600 per cent in three decades.

The survey which covers the period from 1895 to 1927, was conducted by Wayne W. Soper, research associate, and Warren W. Coxe, director of the research division of the state education department.

Beginning with an enrollment of 525,000 pupils in 1895, high schools in the states reported 4,400,000 students in 1927, the last year for which figures were given. The growth of secondary education in New York state was no less remarkable with a registration of 50,000 students in 1895, and nearly 400,000 students at present. In New York City alone, the present enrollment is 182,000 students. Although the high-school enrollment grew faster in New York state than in the nation as a whole during the period studied, the trend now favors nation-wide increases over state advance.

A study of the increase in number of high schools in the state shows that public secondary institutions increased 1,347 per cent, while the number of private academies only doubled. In 1927, there were 897 public and 251 private high schools in the State of New York.

The average size of schools rose during the three decades beginning in 1896 from 100 to nearly 400 pupils. Small schools have decreased slowly in number, giving way to large, consolidated institutions. Yet, in 1927, more than half of the schools had enrollments of less than 100 pupils, 88 per cent had enrollments of less than 500, while 92 per cent were below 1,000 pupils.

Another trend noted was that boys now register in larger numbers than do girls, but drop out more rapidly before completing a high-school course.

♦ MR. RALPH DICKSON has been elected a member of the school board of Vancouver, Wash., succeeding Mr. Lloyd Garrison.

The Preparation of the School Budget

James A. Roberts, Assistant Commissioner of Education, Nashville, Tennessee

The school budget is an itemized statement, showing the expected income and probable expenditures for the school year. In this paper I shall, to a large extent, speak in terms of the county, but the principles underlying the making and adoption of the budgets are the same everywhere and there should be no trouble in applying these principles to any particular type of unit.

Reasons for Making a Budget

The laws of this state require a budget to be made out annually and approved by the county board of education and the county court. Some may wonder why this requirement, what are the advantages from this procedure, and what are the reasons for doing so. I shall mention only a few of the more important:

1. Many boards of education, and a majority of the citizens, think of school costs only in terms of the tax rate, without any conception of the actual dollars spent, or how the community stands among other similar communities as to school expenditures. A carefully worked out budget will enable the taxpayers and the board of education to see where their money is being spent. If a proper use of the school funds is shown by this budget, the confidence of the taxpayers will be secured which will certainly develop greater willingness to supply funds.

2. Without a carefully worked out budget, the superintendent and board do not know enough of the distribution of expenditures among the different items of school costs, and the public will know nothing at all of it. The budget, properly formulated, guarantees a proper relation in expenditures for different purposes. That is, it assures each item its proper proportion of the school funds.

3. A properly prepared budget provides for a wiser use of school funds, by preventing an undue expenditure for any specific purpose, and in this, effects both economy of funds and of returns therefor.

Principles of Budgetmaking

I shall discuss very briefly some of the principles underlying the making of a budget; and incidentally its presentation and adoption, and its administration.

As previously stated, the laws of this state require that the superintendent prepare the budget and present it to the board of education. After its adoption by the board, it is to be presented to the county court for final adoption. It will be seen that the initial and major responsibility of making a budget rests upon the superintendent. This is as it should be. He is the executive officer of the board of education and the expert professional head of the school system. It is his function to outline policies, including the manner of expending school funds, and to present them to the board for approval.

Preparation of a Budget

I would not have you infer, however, that the making of a budget is a one-man job. On the other hand, the closest coöperation should exist between the superintendent and those working under him, and between him and his board of education. He can, and should, secure necessary information from his teachers and principals as to the amount of supplies left on hand, and the needs of the schools for the next year; and from his board he can secure invaluable information regarding the attitude of the people toward their part in the program; namely, furnishing the money. In making the budget, the superintendent should compare the expenditures during the present year with the previous one or two years and give reasons for, and justification of, material differences. He should consider any fluctuation in prices and make reasonable allowance therefor. He should study the trend of enrollment in the schools and make due allowance for the probable increase or dejected improvements and be able to justify the proposed expenditures for this purpose. Finally, he should carefully examine the present system of operation and eliminate all waste in expenditures.

The budget should include every item for which an expenditure is contemplated and should be carefully analyzed in detail. Of course, a lump sum can be requested, but this is not a budget. Neither the county court, nor the taxpayers, will know for what their money is to be spent, nor can you easily defend your demands against criticism, unless all the items are set out so that they can be understood.

In making the budget, a proper proportion should be maintained; that is, too large an expenditure should not be allowed for a certain item or items. Of course, actual needs should be provided for, but we should be sure that these are necessities and not merely some fancied desire, or unjustifiable luxury. It would be of some assistance to the superintendent to compare the percentage of expenditure for each item in his county with that for corresponding items in other counties having approximately similar conditions A city superintendent might make similar comparisons with the expenditures in other cities of the same size and type. Again, we might compare our expenditures with those in other states, or with those of the nation. Generally considered, that budget is best which allows the largest proportion for instructional purposes and the least possible for other purposes without lowering the efficiency of the teaching.

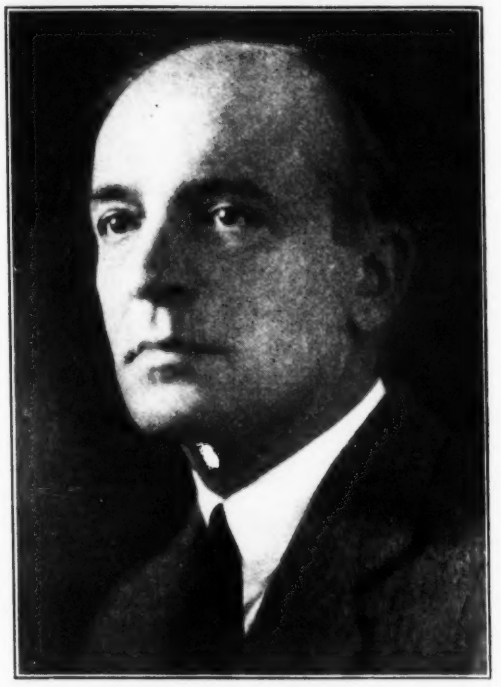
I have made some comparisons of expenditures for the different purposes in Tennessee with those for the same purposes throughout the nation, and find that in this state the counties are spending a larger proportion of their money on teachers' salaries than is being done throughout the country. I would remind you that comparisons very often prove nothing. The mere fact that one community is spending more or less than some other community will not prove which, or whether either, is spending the proper amount. At best, comparisons of this sort can show only the average amount spent. Therefore, the comparisons made do not necessarily prove that Tennessee is spending its money more wisely. In fact, though I might not be able to prove my suspicion that we are starving our schools for comfortable buildings, suitable equipment, and sufficient instructional supplies by using too large a proportion of our money for teachers' salaries; yet I feel rather sure in my opinion that the majority of our schools are in dire need of those things and that a larger share of school funds could be wisely used for this purpose.

In preparing the budget, it should be honestly made and honestly set forth. The minimum amount actually needed, the irreducible minimum, should be set out. Then, when you go before your court, you can defend it against criticism. If the amount set out is not allowed, the responsibility then rests on the court. In addition, you have the satisfaction of knowing that you have dealt honestly with your court, and in time the court will be compelled to acknowledge your honesty, and their confidence in you will be increased. You may "pad" your budget on the theory that "it will be cut anyway" and you will have left all you had expected to get. I know of no surer way to prevent the court from having confidence in you and your management. Besides, such practice is not in accord with my idea of the ethics of school practice.

In preparing a budget, we may be disposed to feel that our only responsibility is to distribute or provide for the expenditures, and that it is the sole responsibility of the court to provide the revenue. Now, a budget must have two sides, an income side as well as an expenditure side. These two sides should balance and it is our business to show how they can be made to balance.

The superintendent should know all the possible sources of revenue and the amount that can be made available from each. He should

(Continued on Page 78)



WILLIAM J. SHRODER
President, Board of Education,
Cincinnati, Ohio

Mr. Shroder has entered upon his sixth term as President of the board. His leadership as a school administrator, his grasp of the problems which attend a large city school system, and his fine character as man and citizen, have won for him the distinction conferred upon him.

DR. JAMES N. RULE
Acting State Superintendent of Public Instruction,
Harrisburg, Pennsylvania

Dr. Rule, who has been Deputy State Superintendent of Schools since 1923, has recently been appointed Acting State Superintendent, to fill a vacancy until a successor is appointed to Dr. John A. H. Keith. Dr. Keith's term expired on January 24.

Dr. Rule is a graduate of Washington and Jefferson College and has been engaged in educational work since 1898. In 1912 he was principal of the Central High School at Pittsburgh, Pa., and in 1916 resigned to become principal of the Schenley High School in the same city. In 1921. he became director of science in the Pennsylvania State Education Department, where he remained until 1923, when he was made Deputy Superintendent of Public Instruction. He has served as secretary of the State Council of Education from 1925 up to the present time.

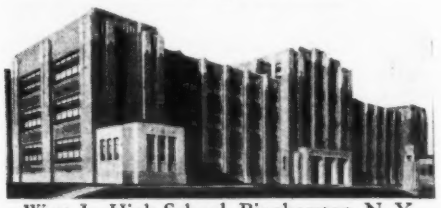
Institute of Biology, *Harvard University*, Cambridge, Mass.
Architects: Coolidge, Shepley, Bulfinch & Abbott, Boston.

N. C. State College of Agriculture and Eng. Thompson Memorial Gym, Raleigh, N. C.
Architect: Hobart B. Upjohn, New York City.

Fordson High School, Dearborn, Mich.
Architect: H. J. Keough.

University of Arizona — School of Mines and Engineering, Tucson, Ariz.
Architect: John B. Lyman, Jr.

Joseph E. Brown Jr. High School, Atlanta, Ga.
Architect: Pringle & Smith.

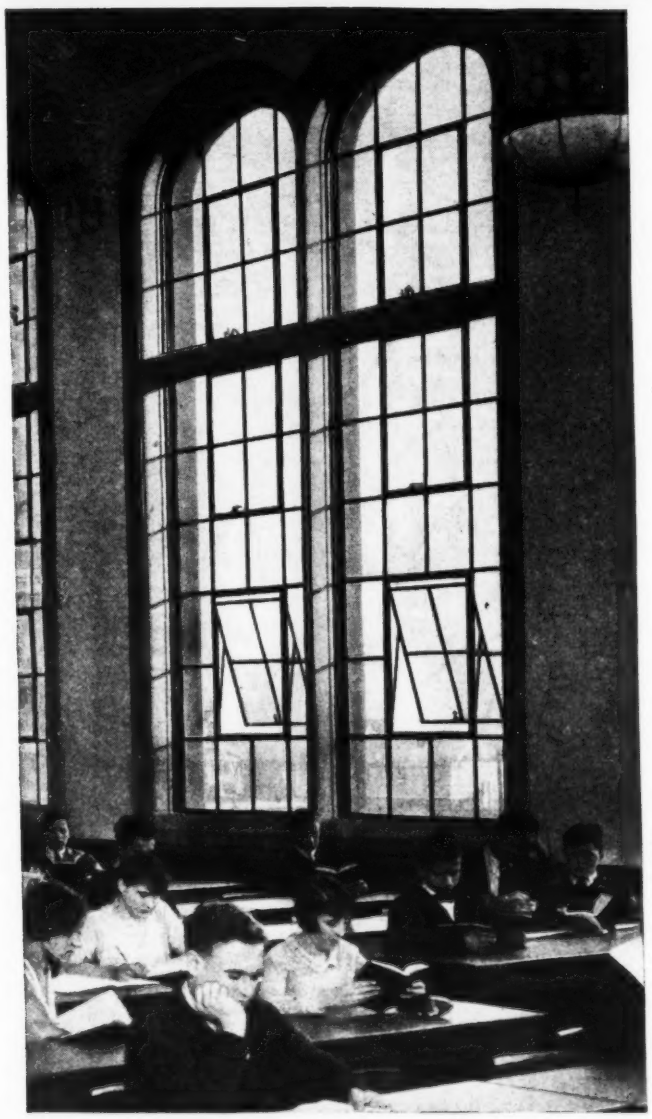


West Jr. High School, Binghamton, N. Y.
Architect: A. T. Lacey & Son

Michigan State College — Home Economics Building, Lansing, Mich.
Architect: E. A. Bowd.

Christopher Columbus School, Binghamton, N. Y.
Architect: Tiffany & Kaley.

University of Southern Calif.—School of Law, Los Angeles, Calif.
Architect: John & Donald B. Parkinson.



A MODERN SUBJECT FOR STUDY

• STEEL WINDOWS FOR SCHOOLS

Windows in a school building are probably more important than any other single item in school construction — a subject worthy of study by anyone responsible for school lighting, school ventilation, school economy in general.

Consider, for example, a few of the advantages which Fenestra "Fenmark" Windows provide — advantages now found in hundreds of schools from coast to coast.

1. Pleasingly designed for simplicity, continuity and restraint to harmonize with all types of school buildings. Solid bronze hardware is most attractively designed.

2. Projecting ventilators are arranged to provide practically any amount of ventilation desired up to 100%.

3. Solid rolled steel construction permits the use of narrower sections, thus admitting more light through any given sized opening. More wall space is available for blackboards. A proper relation between window area and floor area is maintained.

4. Built of heavy, solid, rolled steel sections, these windows are rugged, durable, permanent, fire-resisting.

5. All ventilators are designed to insure weathering as tight as a wood window weatherstripped. Ventilators operate easily and quickly — never stick or warp.

6. Every square foot of glass area can be easily and quickly washed from the inside, by low-cost labor.

7. Fenestra Windows, installed, cost little more than ordinary windows, while upkeep costs are reduced to a minimum. Their small lights of glass are easily replaced when broken.

Fenestra demonstrations, made without obligation for school architects, school board members and school officials. Phone the local Fenestra office.

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Ask about HOLORIB ROOF DECK and SANACOUSTIC HOLORIB — *also made by the Detroit Steel Products Co.*

(Continued from Page 76)

know how much may be expected from the state, from county offices, tuition, contributions, donations, or other sources. He should know how much must be secured from taxation, and the rate necessary to produce this amount. Such an understanding on the part of the superintendent will aid the court in solving their part of the problem of raising the revenue and will provide the basis for mutual understanding and coöperation between the superintendent and the court. If our study of the revenue side of the budget shows that an impossible tax rate will be necessary to balance our proposed budget, there is only one thing to do, reduce the expenditure side until it comes within the possible income.

Lastly, the budget should be made with care. Every item should be carefully considered in order that nothing be included that can be eliminated, and nothing be omitted that is absolutely indispensable. For this reason, several months should be given to its preparation. It should be completed sometime before the beginning of the fiscal year, so that if changes are made your plans can be changed accordingly.

Presentation and Adoption

The law of the state requires that the budget shall be presented by the superintendent to the board of education for approval or modification, and then to the court for its adoption at the April term. If the superintendent and the board have coöperated properly in the making of the budget, there will be little, if any, change made by the board.

After it has been approved by the board, it must be presented to the county court, which in this state is the body charged with the responsibility of levying taxes and appropriating monies. Assuming that the budget has been carefully and scientifically made, justification for every request should be set out both in writing and by personal conferences, between the superintendent and the board of education on the one hand, and the county judge, the finance committee, and the members of the court on the other.

All reasonable and ethical means should be used to secure its approval by the court, and the extent to which it is passed unchanged is a good indication of the efficiency of the superintendent and the board. The superintendent should not attempt to force the court to levy an impossible tax on the people, but should study carefully the needs of the schools, and the ability of the people to meet these needs. He should then strive to bring the taxpayers into sympathy with his views. In this way he will be coöperating with the court and can aid materially in securing the adoption of his budget.

This implies that full publicity has been given to the needs of the schools. When the superintendent has been able to secure the sympathy and support of the public in his program, the adoption of the budget, and the levying of taxes by the court are a foregone conclusion.

Administration

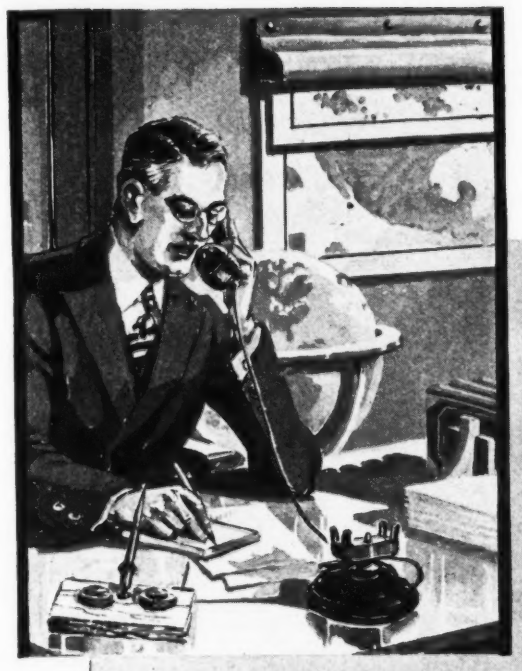
The third, and last, general division of the budget is its administration. When the budget has been made and approved, it should be followed. Except under extraordinary circumstances, expenditures for any item should not exceed the amounts specified in the budget for those items. Even then the approval of the court

(Concluded on Page 81)

Per Cent Each Item of Expenditure is of Total Current Expenditures

ITEM	*United States* *All Schools* 1921–22	*Tennessee* *Co. Ele. S.* 1928–29	*Co. H. S.* 1928–29	*City Ele. and H. S.* 1928–29
General Control	3.75	4.63	2.52	3.78
Per Diem Board of Education	1.40	.39	.22	
Other Expenditures Board of Education		.15	.07	
Salary of Superintendent	2.35	1.67	.16	
Salaries, Clerks and Stenographers		.40	.32	
Census Enumeration		.18		
Trustee's Com. County Funds		1.40	1.44	
Other Expenditures General Control		.44	.31	
Instructional Service	73.73	79.75	81.10	82.56
Salaries of Supervisors		.41	.31	1.24
Salaries of Principals		.09	.25	2.58
Salaries of Teachers	69.93	78.06	79.00	74.95
Supplies for Instructional Service	2.45	.60	.75	1.02
Libraries	.37	.27	.30	.30
Other Expenditures Instruc. Service	.35	.32	.49	2.47
Operation of Plant	12.92	4.74	5.29	6.17
Wages — Janitors and Engineers	6.35	1.33	2.56	3.61
Fuel, Water and Other Expenditures	6.57	3.41	2.73	2.56
Maintenance of Plant	3.55	2.72	2.78	5.11
Repairs		2.03	2.39	
Replacements		.69	.39	
Auxiliary Agencies	3.42	6.36	6.88	1.02
Enforcement Comp. Ed. Law	.43	.63	.12	.45
Promotion of Health	.26	.04	.01	.39
Transportation of Pupils	1.85	5.55	6.74	.03
Other Auxiliary Agencies	.88	.14	.01	.15
Fixed Charges	2.27	1.79	1.43	1.49
Insurance, Rent, etc.				

Information on Strowger P-A-X may save you much—yet it will cost you nothing « «



The school executive who reads this magazine to get ideas for more efficient operation or more up-to-date administration, will be interested in knowing why Strowger P-A-X is being specified for so many new schools and is being installed in an increasing number of old ones.

This information is contained in a booklet which has been prepared by Strowger engineers after long years of experience in meeting school communication requirements. If you are planning a new school building, this booklet will give you some new and useful ideas on school telephone systems. If your school is not new, it will show you how you can take a definite step towards modernization and greater efficiency.

This booklet is yours merely for the asking. It will not obligate you in any way, and we think you will find it interesting and useful, whether Strowger P-A-X can serve you now or not. Use the coupon below.

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Veltone is a new and unusual type of resilient floor for schools. It brings you a beauty never before found in any other floor material—yet at the same time offers every practical advantage and every economy that a school could require.

As you can see by the picture, Veltone is an uninterrupted flow of delicately blended colorings. There are no tiles, no mortar lines, no repeats of any kind. When properly laid, Veltone is apparently seamless—an unbroken expanse of mellow color from wall to wall.

Still another charm of Veltone is its variety. Every yard has its own personality—a delightful individuality in color combining and veining. Yet these little differences are never so marked

Continued on next page

Continued from preceding page

that they shout for attention. Veltone is rich—yet always harmonious and restrained.

And that is precisely why Veltone *belongs* in the school building. In a classroom it is cheerful and colorful without giving an "over-decorated" look. In the principal's office, main hall or assembly room, it makes an exceptionally fine-looking floor which adds to the distinction of any style of furnishing.

Veltone is a Sealex Linoleum—made sanitary and easy-to-clean by the Sealex Process. Like all Sealex Linoleums, it is quiet and resiliently comfortable underfoot—and famous for durability.

Another inexpensive way to give an extra touch of distinction to a school floor is to add a Sealex Linsignia. The "Compass" illustrated here is an interesting example of how readily even fairly intricate designs may be executed in Sealex Linoleum. These insets are cut out at our factory and shipped ready for installation. Your Sealex Linsignia may be your own conception—the school monogram or seal —or one of our standard designs.

Write our Architectural Service Department for further information on Veltone or Sealex Linsignia.

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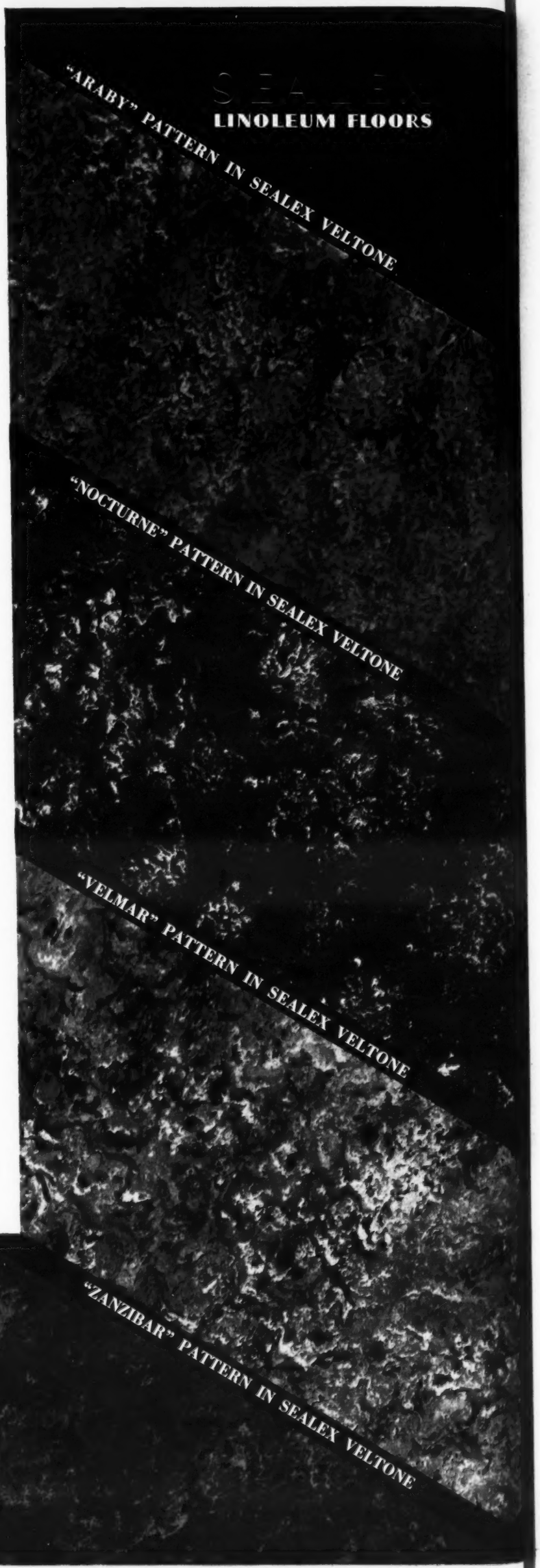

SEALEX LINOLEUM

(Concluded from Page 78)

should be secured for a transfer of funds from one item to another. It is conceivable that unusual conditions may make this procedure necessary, but upon the whole, if the budget has been carefully and properly made, the expenditures will follow rather closely those set out. The ideal budget; of course, would come out exactly even at the end of the year. This probably rarely happens, but, generally speaking, if there is either a considerable deficit or balance at the end of the year, this is conclusive proof that the budget was made upon insufficient information.

In order to prevent overdrawing any items, there should be frequent checks of the expenditures under different heads, against the appropriations for these purposes. This is necessary, because the law imposes a penalty upon any official voting for, or approving, any expenditure in excess of the appropriation for that purpose.

School Law

THE LEGAL RESIDENCE OF THE CHILD

An interesting case, hinging upon the question of legal residence and domicile of the school child, has recently been adjudicated in the State of New Jersey.

The board of education of Branchville, Sussex county, New Jersey, refused to pay the tuition of two children attending the Newton High School. The mother, a widow, who resides at Branchville, found it expedient to place her children with friends in Newton where they work for support and schooling.

The Supreme Court held that the widow was a legal resident of Branchville, had voted there on two occasions, that the children had always been under the guidance of their mother, and that as a matter of necessity the children had temporarily changed their domicile. The court also held that while the children had changed their domicile they had not changed their legal residence, which was with their mother. Hence the Branchville board of education was ordered to pay the Newton High School tuition fee.

WISCONSIN SCHOOL LAW DECISIONS

The state department of public instruction of Wisconsin recently issued the following opinions:

Nonresident graduates from parochial schools, who are planning to enter high schools are required to take and pass the final examinations given by the county superintendent to the graduates of the public schools in order that they may be privileged to enter a high school free of personal tuition charge.

The fact that a merchant owns property and conducts a business in a village does not give him a valid claim for free tuition for his children when it occurs that he has his home on a farm outside the district and carries his children to and from the village school.

Where a school board contracts with a teacher for a definite term of service and the school is closed upon an order of the board of health because of the prevalence of a contagious disease, the district is liable for the teacher's salary for the time the school is closed. The ground upon which this opinion rests is that the nonperformance of the contract was through no fault of the teacher.

LAW AND LEGISLATION

♦ School funds tied up in banks which have been closed is embarrassing a number of school districts in Missouri. The Springfield Court of Appeals has handed down a decision which offers rulings on several points. It says: (1) bank does not become a depository merely by designation, but must qualify by giving security; (2) deposit received from a school district without bond in violation of the law, is held a trust fund payable out of assets in the hands of the commissioner as a preferred claim.

♦ In the matter of tuition fees, the Wisconsin state department of education recently rendered the following opinion: The statute provides that where there is a high school in one of the adjoining states nearer to the home of the pupil than a high school in this state, he may attend the nearer high school. In such cases the town or village is responsible for the tuition fee charged. If, however, pupils residing in a district maintaining a high school or in the immediate vicinity of a high school maintained in another district, attend a high school in an adjoining state, the parent or guardian of the pupil is personally liable for the tuition to be paid to the high school in another state.

♦ The circuit court of Walworth county, Wis., in the case of Elmer B. Johnson, against the school board of Lake Geneva, has rendered a decision favorable to the school board as defendant. The court, in its decision, pointed out that the contract signed was not in accord with the motion adopted at the April meeting, and that it specified only that the plaintiff was to serve as superintendent. The contract, it appears, was never reported to the board, approved, ratified, or confirmed at a subsequent meeting, nor was it given force by the plaintiff's alleged performance of the duties during the month of July, 1930. The decision which was given by Judge E. B. Belden as circuit judge, asked that the defendant be given judgment.

♦ The board of education of Kenosha, Wis., has ruled that no married women teachers will henceforth be employed. Those now in service will not be rehired after June, 1932. Teachers who have taught ten years or more, or those who are within five years of the retirement age, are excepted under the ruling.

♦ The question of removing nonresident teachers from the Milwaukee schools has culminated in a legal opinion to the effect that such removals cannot lawfully be engaged in. Where a teacher holds a contract she is secure in her position whether she lives outside of the city or not. The board of education has the authority, however, to make such rules as may compel teachers henceforth appointed to live within the city limits.

♦ An examination made by the state auditor of the business methods employed by the board of education of Urbana, Ohio, has resulted in a severe criticism. It is claimed by the auditor that illegal payments were made to firms in which board members have financial interests.

♦ Attorney General Bettman of Ohio, in a recent opinion, holds that where a county board enters into a contract with the county superintendent, whereby the board agrees to pay a definite sum for the salary, the board is precluded from granting any further allowance for traveling expenses.

♦ The office of the attorney general of Wisconsin, in a recent decision given to the state superintendent of public instruction, regarding the school-building bonds, of Waupaca, has ruled that the board of education of the city of Waupaca is without authority to issue bonds for school purposes. Quoting from the state laws, the attorney pointed out that the powers of such a board of education are set forth in section 40.53 of the laws, to borrow money or to issue bonds for school purposes. Such a board is without power to levy taxes for school purposes, that power being expressly conferred upon the common council of the city by the laws. Bonds for the erection of a school building should be issued by the city, and not by the board of education. In the case of Van Brunt v. Joint School Dist. 185 Wis. 493, the attorney pointed out that this did not apply in the Waupaca case because this was not a city school.

♦ The attorney general of Ohio, in a recent opinion, holds that boards of education may not acquire property for commercial purposes, or for other than school purposes. Under the ruling, if a school board owns property and is not using it for the purpose originally intended, it is violating the law in renting it for commercial purposes. The decision particularly applies to Lockland, where the school board owns two houses and lots which are being rented, the board receiving an income from them. The land was originally purchased with the idea that a new high school would be erected on it. Later it was decided to make the high school part of the original building and not a separate structure. Having no immediate use for the buildings, the board rented them.

SCHOOL LAW

School-District Government

The appointment of a county superintendent, being complete when the board of education adjourned, is held irrevocable, unless a vacancy occurs, notwithstanding the absence of the superintendent's formal acceptance (Ky. statutes, §§4399a-7, 4399a-10).—Board of Education of Boyle County v. McChesney, 32 Southwestern reporter (2d) 26, 235 Ky. 692.

An attempted election of a school superintendent two years before the expiration of the term of the superintendent previously elected for a four-year term is held invalidated (Ky. statutes, §§4399a-7, 4399a-10).—Moore v. Johnson, 32 Southwestern reporter (2d), 353, Ky.

The failure of members of a board of education, constituting a body corporate, to take an oath, creating a vacancy under the statute, did not impair the corporate existence (C. S. Supp. 1924, §§5410, 5414, 5419; N. C. laws of 1929, c. 180).—Crabtree v. Board of Education of Durham County, 155 Southeastern reporter 550, 199 N. C., 645.

Where the voters at a school election could exercise an independent choice in selecting a person for office, it was not a duty of the judges of the election to count illegible ballot for one or the other of the two candidates.—Winters v. Pasheco, 292 Pacific reporter 1061, Colo.

The county court properly determined that a questionable ballot in a school election was unintelligible, and illegible and should be disregarded. —Winters v. Pasheco, 292 Pacific reporter 1061, Colo.

Where a county court had determined that an election for a school-district treasurer had resulted in a tie, the court should have ordered a special election (C. L. 1921, 8327, 8329).—Winters v. Pasheco, 292 Pacific reporter 1061, Colo.

School-District Property

A statute prohibiting a school officer from being personally interested in any school contract is held inapplicable to any remote interest which a school officer might have under many and varied circumstances (Mich. comp. laws of 1915, §5671, as amended by the public acts of 1927, No. 319, pt. 2, c. 36, §9).—Thompson v. District Board of School Dist. No. 1 of Moorland Twp., 233 Northwestern reporter 439, Mich.

School-District Taxation

A statute authorizing a school board to borrow money and to issue bonds for schoolhouses, and vesting the board with authority to borrow after an election authorizing the loan, was held not mandatory (Mo. rev. statutes of 1919, 11127).—State ex rel. Whitehead v. Wenom, 32 Southwestern reporter (2d) 59, Mo.

Where an election authorized a school board to borrow money for a central school building, the board could not be compelled to borrow for a high-school building only (Mo. revised statutes of 1919, §11127).—State ex rel. Whitehead v. Wenom, 32 Southwestern reporter (2d) 59, Mo.

The acts of a board of education, *de jure or de facto*, who failed to take an oath, could not be annulled in a taxpayers' action to restrain the school construction (C. S. Supp. laws of 1924, §§5410, 5414, 5419; N. C. laws of 1929, c. 180).—Crabtree v. Board of Education of Durham County, 155 Southeastern reporter 550, 199 N. C. 645.

The evidence was held not to show an abuse of discretion by a board of education as would warrant interference with the school site.—Crabtree v. Board of Education of Durham County, 155 Southeastern reporter 550, 199 N. C., 645.

Teachers

The husband of a teacher engaged by a school district was held not directly or indirectly interested in a contract as a school officer, so as to render the contract invalid (Mich. complete laws of 1915, §§11478, and 5671, as amended by the public acts of 1927, No. 319, pt. 2, c. 36, §9; Mich. public acts of 1927, No. 319, pp. 610, 680).—Thompson v. District Board of School Dist. No. 1 of Moorland Twp., 233 Northwestern reporter 439, Mich.

A school teacher, not having a valid contract, had no right to continue her performance, and as a matter of law, she sustained no injury when her employment was terminated after two and one-half months (Wis. statutes of 1921, §§ 40.24, 40.28 (1). —Harris v. Joint School Dist. No. 6 in Towns of Nepeuskun and Utica, 233 Northwestern reporter 97, Wis.

♦ Mr. O. E. Knutson, of Egan, S. Dak., has been elected superintendent of schools at Pipestone, Minn., to succeed C. H. Maxon.

Washington Correspondence

A. C. Monahan, formerly U. S. Bureau of Education

Nonresidents Attending Washington Schools

A total of 2,477 children, residents of Maryland, Virginia, and elsewhere, are attending the public schools of the District of Columbia. Of these, 33 are in the two teachers' colleges, 878 in senior high schools, 389 in junior high schools, 839 in elementary schools, and the others in vocational, vacation, and night schools. Of this number only 71 are paying tuition. The other 2,406 are members of families of government employees and by an act of Congress are permitted to attend the district schools, without payment of tuition or other charges. The total paid to the district for tuition by the 71 mentioned is $6,488.36. At the same rate of tuition the other 2,406 would pay $217,854.82.

Considerable objection to the attendance of nonresidents in the district public schools without tuition is raised from time to time by the taxpayers. They hold that, if Congress wants government employees living outside the district to have the privilege of sending their children to the district, without the payment of tuition, that it should provide a special appropriation to cover the cost. When the measure was enacted, the cost of the district government including the schools, was borne equally by district and federal funds. Now the burden is almost entirely on the taxpayers, as Congress provides but a small portion of the money required each year for the district. While the district can use only such money as is appropriated by Congress, it is not generally known that the greater part of the money appropriated is money raised by district taxation. The part coming from other monies is generally conceded to be less than would be paid to the district if the government property in the district was assessed taxes at the same rate as private property.

Tuition rates in the Washington schools are: teachers' colleges, $195.36; senior high schools, $122.62; junior high schools, $96.90; elementary schools, $71.52; vocational, $157.14; vacation, $4.74; and night schools, $10.90.

State School Administration

In a recent statement, Dr. Wm. John Cooper, U. S. Commissioner of Education, calls attention to a nation-wide tendency in the administration of the affairs of the states, that may seriously affect the present recommended state school administration. He says, "If the present tendency of the public to hold the governor primarily responsible for all state functions continues, radical reorganization of the executive departments of most states will be necessary. The first step in this direction is to set up the executive budget, giving the governor major control over expenditures. The second step is the establishment of a cabinet system of administration. This logically implies the right of the governor to appoint the chiefs of all departments.

"Education cannot expect to escape reorganization under such conditions. Boards of education under such a scheme, would either disappear, as in Illinois and Ohio, or become merely advisory, as in Massachusetts, if the educational department is not to be rendered ineffective by dual control.

"For many years, however, experts in school administration have been unanimously in favor of the appointment of the chief school executive by a state board of education, with some differences as to how the members of the board should be selected. In general, they favor the appointment of these board members by the governor, for terms sufficiently long to prevent his use of the office for political control."

Commissioner Cooper suggested the need of an extended inquiry into this situation, financed by some foundation, to be made under the direction of a commission consisting of three outstanding experts in school administration, and three political scientists interested in state administration.

Kindergarten Enrollment Increasing in the United States

An increase of more than 50 per cent has been noted in kindergarten enrollment throughout the United States during the past ten years, according to a recent study of the U. S. Office of Education.

Kindergartens are now regarded as an integral part of the United States school system in eight out of every ten cities of 30,000 or more, and in five out of every ten cities and towns having populations of 2,500 or more.

The average kindergarten child is 5½ years old the latter part of the school year. He is one of a class of 52 taught by one person, and is in school three hours a day. His mental age slightly exceeds his chronological age.

The average first-grade child is 6½ years old the latter half of the school year. He is in school from four to six hours a day. There are an average of 40 in the first grade, taught by one person. More than 2,000 children from 2 to 5 years old are attending pre-kindergarten schools. These schools furnish early training and excellent opportunity for observation of behavior and adjustment problems in boys and girls before they reach kindergarten or primary-grade age.

Publications of U. S. Office of Education

The U. S. Commissioner of Education has adopted several new plans of announcing to the school public the available publications of the office. One is the publication from time to time of special lists for special groups of teachers. A recent one of this sort is, *Publications of the U. S. Office of Education of Special Interest to High School Teachers,* giving the names and authors of all bulletins in secondary education published since 1914.

Another plan is the issuing in circular form, at rather frequent intervals, of a circular entitled *Announcement of Recent Publications,* which is sent out to a large general mailing list. *School Life,* the monthly publication of the bureau, will no longer be devoted to general educational matters, but will confine its columns largely to reports of what the government, and particularly the Office of Education, is doing for the promotion of schools and colleges. It will keep the school public informed relative to the store of publications, maps, pictures, and services offered by other Federal offices, and how they may be obtained by school authorities.

Additional Educational Duties for the Department of the Interior

The administration of governmental matters in the Virgin Islands has been transferred from the Navy Department, to the Department of the Interior, by order of President Hoover. Civilian officials will replace all navy officers now connected with this work. Dr. Paul M. Pearson of Swarthmore College, Pennsylvania, who has been made governor, will be responsible for the educational work of the islands, acting through the constituted educational authorities. He, in turn will be responsible to the Secretary of the Interior.

Dr. Pearson, who is well known in educational circles, is a graduate of Baker University, in Kansas, and did graduate work at Northwestern University. He taught in Cherryville, Kansas, and later at Northwestern University, from which he went to Swarthmore College.

(Concluded on Page 86)

As the Plans Are Drawn Three Ghostly Generals Ride

As the plans for any public or semi-public building, involving plumbing and plumbing fixtures, are drawn, three grim shadows mount ghostly steeds and figuratively start for the job.

They are: *Failure, Short Life* and their hideous brother in arms, *Insanitation.*

No matter what your interest in plumbing may be don't hesitate to call in the Clow Soldier of Sanitation. Behind him stands the most complete line of specialized plumbing fixtures in the world. Or ask for the Clow Catalog covering the type of building you are interested in.

They lead unseen armies to attack any fault or flaw in design, construction, quality or fitting of the plumbing fixtures. Whether these three notorious generals and their commands reach the job you are planning or not depends upon what is written into the specifications.

For 52 years the Clow Soldier of Sanitation has been fighting and defeating this enemy.

To this end Clow has developed a line of specialized plumbing fixtures unrivalled anywhere in the world, designed particularly to meet the acute needs of schools, hospitals, industrial plants and public buildings as well as dwellings.

And Clow goes to unmatched lengths in assuring that these fixtures will meet those needs. As a matter of fact, all fixture batteries are set up completely before shipment and tested under conditions simulating those of the actual installation.

Write such plumbing into your specifications and the three notorious generals and their ghostly hosts are routed before the plumbing fixtures are even installed.

CLOW

CHICAGO

PREFERRED FOR EXACTING PLUMBING SINCE 1878

Consult your architect

(Concluded from Page 84)

Building Program for the District of Columbia

The house appropriations for the District of Columbia provide for more school-building expansion than was previously provided in a single year. Money is provided for carrying on the construction of the new Roosevelt High School to cost over one million dollars when completed, two junior high schools, three secondary schools, and additions to five junior high schools, and seven elementary-school buildings. This would provide approximately 100 additional classrooms for elementary school children over the number now in use.

Building Program for Montgomery County, Maryland

The Montgomery county (adjacent to the district) board of education is considering the adoption of an extensive building program, requiring over half a million dollars, to properly house elementary-school children in the county, particularly those in the rapidly growing suburbs of the District of Columbia. Over 18,000 children are attending the county schools. The increase in the past few years has been due to the rapid spread of the city of Washington over the district line into the county. Approximately a thousand children of employees of the government are attending schools in the district. This they may do without the payment of tuition. Congressmen have proposed several times recently that this no longer be permitted. If the present law were changed it would force a larger additional outlay in the county to provide buildings.

White House Conference on Child Health and Protection

The final report of the White House Conference was presented at a meeting held recently in Washington. This was the report of the Medical Service Section, Dr. Samuel McHamill of Philadelphia, chairman of the section, presided. Three main committees gave the results of their findings; (1) the Committee on Growth and Development; (2) the Committee on Prenatal and Maternal Care; and (3)the Committee on Medical Care.

The reports include the results of a national survey of 85,000 families in 158 cities, and 25,000 families in rural areas in 42 States, and included such matters as health examinations, dental examinations, vaccination against smallpox, diphtheria immunization, and the influence of economic status and age.

Death of President of District School Board

Charles F. Carusi, president of the District of Columbia board of education, and dean of the law faculty of the National University, died during the past month. He had been a member of the board for six years, and president for four years. Public schools in the city were closed on the day of his funeral. Dr. Carusi was responsible for the converting of the two District Normal Schools into Colleges for Teachers.

Meals for Needy Pupils

The board of education of the District of Columbia has asked the Parent-Teacher Association to provide breakfast and luncheon for needy children in the public schools. A recent survey showed that a considerable number of children came to the school each morning without breakfast, and others had no lunch. Teachers throughout the city have provided for many children, paying for it from their own limited personal funds. The board has no appropriation for such use, and feels that the teachers should not incur the expense. It has therefore asked the Parent-Teacher Association to raise money for this purpose.

Eligibility Requirements for Teaching Principalships

Teaching principals in the Washington school system in the future will be required, before appointment, to show that they are graduates of three-year normal schools, or equivalent institutions. The change requires that they have as much training at least as the teachers in the school system, three years of normal school being now required of them.

Another proposed change in the rules would permit a candidate from outside of Washington to take the examination for the position of administrative principal, now open only to teachers in the school system. At the same time the board increased the requirements for annual substitutes, adding to the two-year normal-school course, two years of experience. Two eligible staffs of substitutes, are maintained one for the grades from kindergarten to the seventh year, and the other for junior- and senior-high-school classes.

Testing Building and Other Materials

School authorities having the responsibility for the erection of school buildings and the purchase of various types of materials, will be interested in a recent list of testing laboratories prepared by the U. S. Bureau of Standards under the title *Directory of Commercial-Testing Laboratories and College-Research Laboratories*. Types of testing work conducted by each laboratory are given in the publication. Copies may be obtained from the Superintendent of Documents at the price of 20 cents.

CHICAGO CORRESPONDENCE

Chicago constructs twelve to fifteen new school buildings yearly. These schools are erected by private contractors who work under the supervision of the school-board architect. The architect heads a Bureau of Architecture, consisting of approximately 150 men, including draftsmen, engineers, superintendents, and inspectors. All of the Chicago school buildings are built from plans prepared in the Bureau of Architecture. This bureau costs approximately $600,000 per year to maintain, and the architect receives a salary of $10,000 per year.

Recently the president of the board of education presented a plan to eliminate the bureau completely. In its place he proposed the creation of a building corporation to be controlled by the city. The directors of the corporation were to be five in number, with a salary of $10,000 per year each, and appointment by the mayor for a life term. The board of trustees or directors would consist of one representative of union labor, one banker, one engineer, one business man, and one architect. Each of the following groups would submit three names to the mayor, and from this list of fifteen, the mayor would appoint the five trustees: Western Society of Engineers, Chicago Chapter of the American Institute of Architecture, the Chicago Clearing House, the Chicago Building Trades, and the Commercial Club of Chicago.

This proposed corporation, which would act independently of the board of education, would issue tax-exempt bonds. The principal and interest payments for these would come from the school-building fund. This, of course, would be a reversal of Chicago's long-time plan of financing capital outlay from current taxes. The plan would not only require legislation by the General Assembly but it would require a state constitutional amendment.

A parent of a 14-year-old senior-high-school girl wrote to the newspapers complaining that the child's teacher advised the girl to read a story about Catherine the Great which the parent considered unfit. Supt. Wm. J. Bogan agreed with the parent. It seems that the book in question was a review of the many love affairs of Catherine, and very realistic. Supt. Bogan condemned its use and appointed a committee to inquire into other books which might be deemed unfit for school use. The teacher held that this book is no worse than some of Shakespeare's works. The newspapers quoted from the book (apparently some of the milder passages) and they seemed pretty bad.

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REVOLUTIONIZING *the* FLOOR MAINTENANCE INDUSTRY!

The SILENT HUNTINGTON *Scrubbing and Polishing Machine*

The Huntington Laboratories, Inc., are now making this Scrubbing and Polishing Machine. It is specially designed to embody all the points of merit a scrubbing machine should have, with none of the unnecessary frills.

It will run one thousand hours with one greasing. It is ball-bearing throughout. It leaves no wheel marks on the floors. It will do more work and cover more floor space per hour than any other machine of its size.

This new machine is furnished on an entirely new plan. Write us for details at once.

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SANA-SEAL . . . .
the perfect Floor Seal **for finishing new Wood Floors and refinishing old oiled Wood Floors.**

LIQUA-SHINE . . . .
the Liquid Wax and *Complete Floor Treatment. Contains Filler, Wax and Varnish.* Quick drying, easy polishing, long wearing. Fine for Linoleum and Wood Floors.

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for cleaning *Asphalt Tile, Rubber, Tile, Marble and Terrazzo Floors* and for scrubbing old oil off of Wood Floors.

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Editorially the newspapers supported the stand of the superintendent.

The Illinois Schoolmaster's Club met at Bloomington on February 6–7. The main meeting was a dinner affair held on Friday night. Floyd T. Goodier, superintendent at Chicago Heights, presided. After mentioning the fact that two years ago they had three speakers, last year two speakers, and this year only one, Supt. Wm. J. Bogan of Chicago was introduced.

Supt. Bogan, who spoke on "Democracy in Education," told how we boast of the number of our high-school graduates, but never mention the fact that 49 per cent of the children never get beyond the ninth grade. He urged a curriculum built for these children, as well as for those who go higher.

At the Saturday morning conference of the Club, Herbert Simpson, of Northwestern University, gave an address on "School Finance," particularly from the standpoint of improvement of assessment machinery. He made two statements which might appear to be in conflict. First of all, he stated that if the Roman Emperors could visit present-day Chicago, some of them would be shocked at the extravagance of municipal government, and others would be mortified at the opportunities which they had overlooked. On the other hand, he asserted that the shrewdest financial wizard in Wall Street could not devise a scheme which would give an equivalent return for the money spent for governmental purposes. He pointed out that for a per-capita expenditure of 29 cents a day, we receive protection from foreign invasion, local police, and fire protection, lessened hazards of disease through sanitary measures, and education for our children. He squared these two statements in an explanation that, under our present system of government, relatively cheap though it is, there is ample room to provide these benefits for considerably less than 29 cents per day.

One of the speakers at the Saturday morning conference attributed a statement to a Chicago high-school principal which, if it represented the truth, would be highly discouraging to parents. The statement was: "The best students in our high school come from orphanages where they have not been subjected to parental influence." A check-up revealed that the Chicago principal was misquoted!

Supt. William J. Bogan has an Advisory Committee of "outsiders"—civic, business, and labor leaders. During the recent preparation of the 1931 School Budget, this committee waged a vigorous battle before the board of education for appropriations for ten educational needs which had not been provided for in the tentative budget. The committee was partly successful, in that the sum of $75,000 was set up to reduce the elementary-school-class size by the employment of 50 new teachers, and a new bureau of research was created, to be known as the Bureau of Research and Building Survey.

The bureau will combine true research with applied research and service, in the fields of education, finance, buildings, and exhibits. Its personnel will consist of a director, an assistant director of educational research, an assistant director of building survey, an assistant in building survey, a supervisor of exhibits, and four clerks.

Superintendent Bogan has appointed Don C. Rogers, a member of the American Educational Research Association, as director of the new bureau.

A SUGGESTION FOR FINANCING EDUCATION IN OHIO

Prof. W. G. Wolfe, of Quaker City, Ohio, newly elected president of the Ohio Education Association, has recently outlined eight points as a basis for approaching a solution of the problem of financing education in the state. Recognizing that reductions in the tax duplicate, as well as other factors, may cause a severe reduction in revenue, the special committee of leaders has outlined a statement of tentative policies concerning the financing of public education. These are:

1. That during times of depression it is imperative that standards of education be maintained and if careful economies permit, to be raised.

2. That the school-tax rates for current cost of operating the basic program of education be the 4.85 mills now provided by statute; i.e., 2.2 local levy and 2.65 state levy.

3. That since the responsibility for education is to be shared by the state and school district, we should consider plans for increasing the state's participation in school support.

4. That the state make use of its power to levy various forms of taxes, other than on real property to defray its part of the cost of education, thereby relieving the real property in the school districts.

5. That the state funds be distributed in a simple manner on some such basis as pupil attendance, thus minimizing the amount of state supervision.

6. That local districts desiring to maintain an educational program more complete than that permitted by an operating levy of 4.85 mills may do so by voting extra levies outside the constitutional limitation of 15 mills provided no more funds are available within the limitation.

7. That districts unable to finance a basic program out of that derived from the state per capita funds and the 4.85 mills levy be given additional state aid out of an equalization and rehabilitation fund similar to that now in use.

8. That all educational authorities put into effect every possible adjustment which will produce economy without sacrifice of efficiency.

A SCHOOL JANITOR HONORED

Thomas Cahoon, who recently retired as janitor of the Jay Hubbell School, Houghton, Mich., after a service of 36 years, was commended by the school board, in a resolution which was adopted and presented to Mr. Cahoon. The resolution reads as follows:

"Mr. Thomas Cahoon, who has resigned his position as janitor of the Jay Hubbell School, was entering his 37th year as janitor of that school. He has not only been an efficient and faithful worker, but he has had the respect of the teachers, pupils, and parents.

"Being janitor of a public school involves more than firing a boiler, or cleaning a building. It means that the janitor must appreciate the essentials of sanitation, and that he understand modern sanitary equipment and methods. The janitor comes into close contact with the children. He must be a man of unquestionable character. It is necessary for him to command the respect of the children. He must feel the responsibility of coöperation with the principal and teachers in the supervision of the children while in the building or on the playground.

"Mr. Cahoon possessed all of these qualifications. He has rendered the community an outstanding service for 36 years and is worthy of the highest consideration."

The Pennsylvania State School Directors Meet at Harrisburg, Pa.

The thirty-sixth annual convention of the Pennsylvania State School Directors Association was held February 4–5, in the Penn High School Auditorium at Harrisburg, Pa. The program—which was divided into three sessions, a morning and afternoon session on the opening day, and a morning session on the second day—was in charge of the president, Mr. Edwin P. Young, of Towanda.

The convention was opened by President Young and was followed with the reports of the various committees, and the election of the nominating committee. Four topics were taken up at the opening session, with Dr. Harris Hart, of Virginia, Dr. M. S. Bentz, of Pennsylvania, Mr. J. C. Shumberger, of Allentown, Pa., and Dr. Robert Shaw, of Pennsylvania, as the principal speakers. Dr. Hart, speaking on "Larger Units of Taxation," pointed out that the most important factor in public education is the equality of teachers. In concluding his address, he complimented the school-board directors of the state for the great progress made with such a complex situation as exists in Pennsylvania.

Dr. Bentz, who spoke on "The Financing of Third- and Fourth-Class Districts," called attention to the fact that the problem in Pennsylvania is practically the same as that of the legislatures of forty other states during the present year. How to equalize school opportunities, how to shift the burden of taxation, or minimize the cost of education is being studied by statesmen everywhere, said Dr. Bentz.

Mr. J. C. Shumberger, who addressed the gathering on the topic, "Some Taxation Problems," said the greatest problem in taxation today is not in administering the law, or collecting the tax, but in keeping the tax within certain limits. Regarding assessments, he said it is possible to forget figures and leave the assessment of property with an honest assessor who will apply the machinery of mathematics. If he is not capable of doing the work honestly, it is up to the proper authorities to displace him, said Mr. Shumberger. Commenting on the tasks of school directors in the problem of taxes, Mr. Shumberger said that school directors today have many perplexing and thankless problems of which the average taxpayer knows nothing. Foresight and a greater practical knowledge of present-day business training will enable the school directors to direct with dignity and honor in their work.

Dr. R. C. Shaw spoke on the subject, "Creating Values." Other speakers who addressed the afternoon session were Mrs. Lois Owen, who spoke on "School Nursing as Related to Child Welfare and Unemployment"; Hon. E. J. Turner, who talked on "A Legislator's View of the Public-School System in Pennsylvania"; and Dr. Hilton I. Jones, who discussed "A Study in Self-Management."

The Thursday morning session was opened by Dr. Waldo C. Cherry, and was followed by reports of the various committees. Dr. I. M. Wright, of Allentown, spoke on the subject, "School Directors' Problems of Tomorrow"; Dr. James N. Rule, of the State Education Department, talked on "Educational Legislation"; and Dr. Lee L. Driver took for his topic, "The Greatest Thing in Rural Education."

The resolutions committee presented resolutions recommending that part of the burden of taxation be placed upon other forms of wealth, or upon incomes and investments; that the association continue its efforts to establish a state fire-insurance law for insuring school properties; that the association support legislation governing the registration of privately owned school busses, operated under a contract with the school district for part-time transportation of school children; that the association give serious consideration to making proper provision for the employment of an adequate number of school nurses in the school districts represented; that the association go on record against a reduction of the salary schedule of school employees and that every effort be made to assist needy districts in meeting the minimum schedule; that a study be made of plans and programs for teachers' institutes in order that more effective benefits may be derived by teachers; that the employment of married women as teachers when they have other adequate means of support be decried in behalf of the large number of prepared and unemployed college graduates who give promise of competency; that the association support the efforts being made to have motion-picture producers eliminate suggestive pictures; that the association support an amendment of the law, giving school districts the full amount of the taxes with penalties, in place of only the face value as at present.

The legislative committee in its report, indorsed the plan of the state education department in its efforts to establish a ten-year program along natural constructive lines, looking toward the development of the state's educational system, commended the education department for its proposed study of the needs of the schools for a larger unit of taxation and administration; endorsed the plan of the department for recodifying the school laws; recommended legislation for protecting school children entering or leaving school busses; recommended that the 4-mill tax on school indebtedness now collected by the auditor general be repealed; suggested that legislation be enacted to relieve land from the full burden of taxation, and that income-producing securities be taxed a proportional share for the support of the local government; decried the discrimination of public utilities against school districts using their power or product, and urged that the legislature act favorably on the program of the governor for insuring the fair regulation of corporations offering their service in the various commonwealths.

The following officers of the association were elected for the ensuing year:

President, Mr. R. M. Baldridge, McKeesport; first vice-president, Mrs. Joseph Scattergood, West

Chester; second vice-president, Mrs. Ida Wallace, Swissvale; third vice-president, Mr. David I. Miller, Allentown; secretary-treasurer, Mrs. Anna Brenneman Dickinson, Harrisburg; directors: Mrs. Warren Marshall, Mr. Charles V. Adams, Mr. George W. Murray, Mr. C. K. Patterson, and Mr. Franklin J. Roth.

NEBRASKA SCHOOL BOARDS MEET AT KEARNEY

The annual meeting of the Nebraska Association of School Boards and Executives was held February 10–11, at Kearney, with President H. O. Schaaf acting as chairman.

Following the registration of delegates, the meeting was called to order by the president. A welcome was extended by President E. H. Staubitz of the chamber of commerce. At the morning session, Supt. C. Ray Gates, of Grand Island, gave a talk on "The School and American Life," while Dr. D. A. Worcester, of the University of Nebraska, spoke on "Devices for the Selection of Teachers."

During the afternoon sessions administrative relations were discussed, subjects primarily of interest to directors of school systems. Mr. John Wiltse, Falls City, talked on "The Superintendent's Obligation to Boards of Education"; Mr. A. H. Staley, Hastings, discussed "The Board's Obligation to the Superintendent of Schools"; and Dr. P. H. Bartholemew, director of health for the State of Nebraska, took for his subject, "School and Community Responsibility for Public Health." There followed a general business discussion, which was in charge of Mr. O. A. Wirsig, superintendent of schools of Kearney. Dr. J. E. LeRossignol, University of Nebraska, closed the session with a talk on "The Present Business Situation." Dr. Paul C. Calhoun, of Lincoln, was the speaker of the evening at the banquet on Tuesday evening, which was in charge of Supt. M. C. Lefler, of Lincoln.

The Wednesday morning session opened with a discussion on "Pending School Legislation," by Mr. E. M. Hosman, secretary of the Nebraska Teachers' Association; Mr. E. J. Overing, Red Cloud, talked on "The Ideal Teacher." Mr. George E. Martin, of the Kearney State Teachers' College, gave a talk on "Abraham Lincoln," and Judge Bayard H. Paine, of the Nebraska Supreme Court spoke at the closing session on Wednesday afternoon.

The meeting adopted resolutions indorsing the tax-equalization plan, objecting to the bill providing that county treasurers get commission for collecting school taxes; indorsing the income-tax plan of financing, and naming a committee to study the Nebraska tax systems. The association also favored the introduction of a character course in the public schools.

The meeting closed with the election of the following officers: President, Mr. John Wiltse, Falls City; vice-president, Mr. H. B. Simon, Norfolk; secretary-treasurer, Mr. J. J. Overing, Red Cloud.

WASHINGTON STATE SCHOOL DIRECTORS MEET AT OLYMPIA

The ninth annual meeting of the Washington State School Directors' Association was held February 10–11, at Olympia. About 150 persons were in attendance, of whom 83 were accredited delegates, 20 were county superintendents, and the remainder visiting school directors and educators. Thirty-three of the 39 counties of the state were represented at the meeting.

The principal address of the session was delivered by President C. H. Fisher, of the Bellingham Normal School, on the subject, "Outstanding Problems in Teacher Service in Washington." Many problems of interest to the educators were discussed in the various sessions.

The association adopted resolutions indorsing the Showalter education bill, the income-tax bill, a bill directing boards of county commissioners to divide receipts from Federal forest-reserve lands and mineral lands between schools and roads, a bill permitting second- and third-class school districts to establish rooms for subnormal children, and a measure opposing House Bill No. 17 for budget control, as originally passed by the House. A resolution indorsing the sales tax was laid on the table.

The association appointed a committee to work this year on a uniform system of keeping transportation costs.

It was decided to hold the 1932 meeting of the association in Yakima.

The meeting closed with the election of the following officers:

President, Mr. S. Frank Spencer, Everett; west side vice-president, Mrs. Iva Mann, Tacoma; east side vice-president, Mr. H. S. Hughes, Hover; executive committee, John Dobie, Yakima; R. H. Lind, Tacoma; secretary, L. D. Burrus, Olympia. — *L. D. Burrus.*

HEALTH-EDUCATION ADMINISTRATION STANDARDS

The physical-education department of the New York State Department of Education has adopted a number of interesting standards for the school systems of New York state on the employment of school physicians and nurses.

School Physicians — One full-time physician for the first 2,000 to 2,500 pupils; one additional full-time physician for each 4,000 to 5,000 pupils; the employment of part-time physicians during the fall medical-inspection period.

School Nurses — One nurse for the first 2,000 pupils; one additional nurse for each additional 2,500 to 3,000 pupils.

Psychiatrist — One psychiatrist for each school system of 20,000 pupils.

Visiting Teachers — One visiting teacher for the first 2,000 pupils enrolled in the schools; one additional visiting teacher for each additional 2,500 to 5,000 pupils.

Supervisor of Health Teaching — One supervisor of elementary grade for each 4,000 to 6,000 pupils; one additional supervisor for each additional 8,000 to 10,000 pupils.

Teacher of Physical Education — One supervisor of elementary grade physical education for each 2,500 to 3,000 pupils; one teacher of physical activities for each 200 to 300 junior-high-school pupils; one supervisor of physical activities for each 400 to 4,000 secondary-school pupils.

Lots of us can remember

WILLIAM GEORGE BRUCE

of American School Board Journal fame

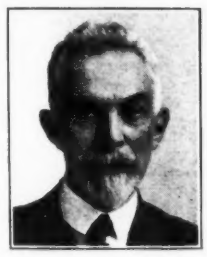
and

GEORGE W. HOLDEN

Inventor of the Book Cover

George W. Holden

chumming together during the Supts. and N. E. A. Conventions — both earnest workers in the cause of Education and — both achieving the highest honors by being beloved and respected by their fellowmen.



William Geo. Bruce

ALL HAIL TO THE "OLD TIMERS"

Contributed by Miles C. Holden

in honor of the 40th Anniversary of this Journal

Personal News of Superintendents

♦ Exercises in commemoration of the completion of twenty-five years of service by COMMISSIONER WALTER E. RANGER, of Rhode Island, were held as part of the 1930 program of the Rhode Island Institute of Instruction. At the conclusion of the institute program, President Towne presented to Commissioner Ranger, on behalf of the school teachers of the state, a box of gold coin and a gold watch chain, on the links of which are engraved the names of the towns in the state. The gifts were provided through voluntary contributions of more than 4,100 public-school teachers, and represented an expression of congratulation in which every teacher participated. Dr. John J. Tigert, formerly U. S. Commissioner of Education, and now in Florida, gave an address eulogizing Commissioner Ranger.

Commissioner Ranger was guest of honor at a dinner arranged by the Rhode Island Institute of Instruction. Dr. H. W. Lull, of Newport, acted as toastmaster. Addresses were delivered by Payson Smith, of Massachusetts; Ernest Butterfield, of Connecticut; Bertram Packard, of Maine; James Pringle, of New Hampshire; and John Barlow, acting president of Rhode Island State College.

♦ MR. F. H. BARBEE was unanimously reëlected superintendent of schools at St. Joseph, Mo., for a term of two years, ending July 1, 1933. His efficient administration of the schools, and his helpfulness in working out a building program, amounting to $2,180,000, won for him the confidence of the board of education. His accomplishments include a new 6–3–3 plan, the introduction of platoon schools, and the building of four new elementary schools, and a senior high school.

♦ MR. CLARENCE E. MILLER, of East Chicago, Ind., has been elected superintendent of schools at Westmont, Ill.

♦ SUPT. A. C. KINGSFORD, of Baraboo, Wis., was the guest of honor at a banquet on February 5, given in honor of his twenty years of service in the schools. The event was sponsored by the alumni association and the citizens, with Mr. T. F. Risley acting as chairman. Among the speakers were M. H. Jackson and F. O. Holt of Madison. Mr. Kingsford was presented with an inscribed plaque commemorating his twenty years of service. He was also presented with a gift from the forty teachers in the schools.

♦ SUPT. JAMES E. PEASE, of North Muskegon, Mich., has been reëlected for a new three-year term, beginning with July, 1931.

♦ SUPT. E. E. DAY, of Marion, Ind., has been elected president of the Indiana Superintendent's Research Club.

♦ MR. C. W. HILL has announced his resignation as superintendent of the Lincoln District schools of Niles Center, Ill.

♦ MR. ALBERT L. COOK has resigned as head of the school system of Harbor Beach, Mich., to take effect at the close of the school year.

♦ SUPT. F. E. LURTON, of Frazee, Minn., has been reëlected for another year.

♦ SUPT. E. P. CLARKE, of St. Joseph, Mich., has been reëlected for another term, after completing 31 years of consecutive service.

♦ MR. S. M. STOUFFER was unanimously reëlected superintendent of the Wilmington, Delaware, schools for another three years, beginning with July 1, 1931. This is the first time in the history of the Wilmington schools that a three-year appointment was made.

♦ H. B. PIGMAN, 58, superintendent of schools of Coshocton county, Ohio, was fatally injured in an automobile accident at Coshocton, on February 4. Mr. Pigman had served as county school superintendent since November, 1923, having succeeded L. C. Shaw. He was elected assistant superintendent under Mr. Shaw in 1921. Mr. Pigman had been engaged in schoolwork since he was 19 years of age.

♦ DR. W. W. THOMAS, for many years president of the Scarritt-Morrisville College, and superintendent of schools at Springfield, Mo., for ten years, died at his country home on February 4.

♦ MR. HENRY VAN HETTINGA, formerly principal of the high school at Muscatine, Iowa, has been elected superintendent of schools, to succeed E. A. Sparling. Mr. Van Hettinga is a graduate of Central College, Pella, Iowa, and has completed graduate work at Iowa University and Iowa State College.

♦ MR. R. A. BUNNEY, superintendent of schools at West Point, Nebr., has announced his retirement at the close of the school year.

♦ SUPT. D. V. MASSER, of Blair, Nebr., has been reëlected for his eighth consecutive term.

♦ SUPT. HARRY S. BERGER, of Deadwood, S. Dak., has been reëlected, with a two-year contract and an increase in salary. With his reëlection, Mr. Berger enters upon his third year in the position.

♦ DR. WILLIAM E. GRADY and DR. EUGENE A. COLLIGAN have been appointed as associate superintendents of schools of New York City. Dr. Grady, who was formerly district superintendent, succeeds Dr. William A. Boylan. Dr. Colligan, formerly principal of the Boys' High School, has done work of an outstanding character in the field of secondary education, and also served in the graduate school of Fordham University, where he holds a professorship. He succeeds Dr. Gustave Straubenmuller.

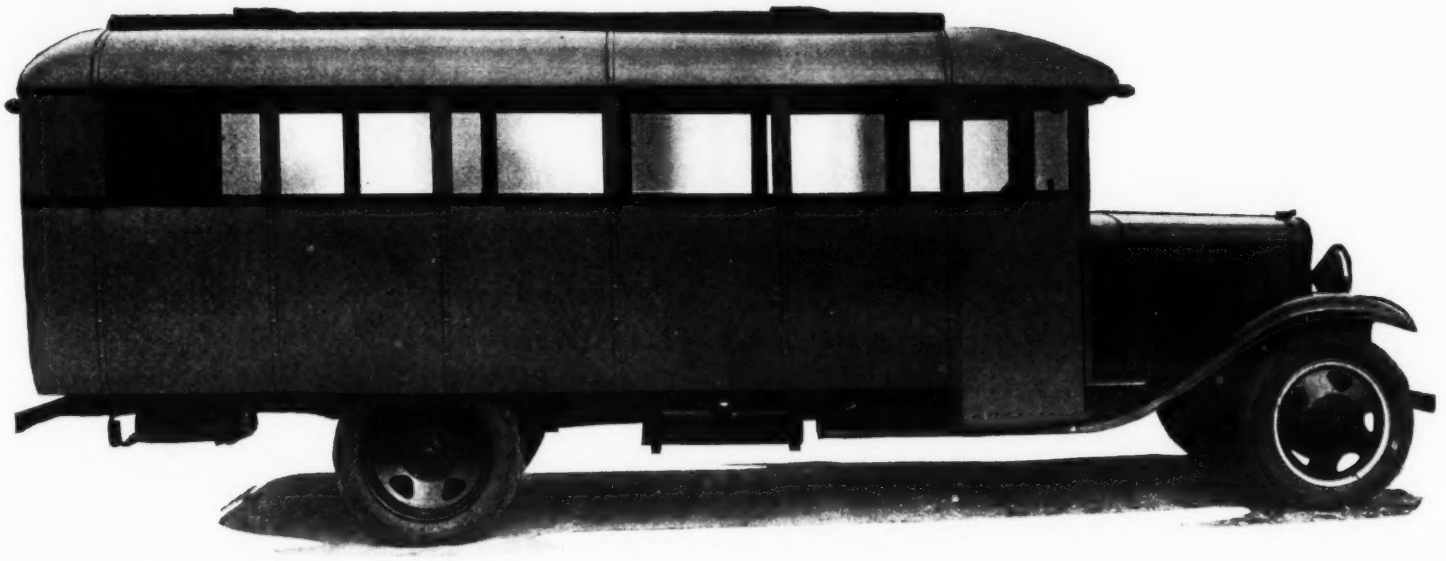
♦ SUPT. W. E. HOFFMAN has been reëlected head of the schools of Mahnomen, Minn.

♦ MR. LEE M. THURSTON has been appointed assistant superintendent of schools at Ann Arbor, Mich.

♦ Youngstown, Ohio. Representatives from all walks of civic, school, and industrial life joined with teachers, principals, and members of the school board in a birthday celebration and party on February 7, to DR. J. J. RICHESON, superintendent of schools. A program of speeches and music was given, with special stunt programs by

(Concluded on Page 96)

Real Protection For Children In This New Superior All-Steel Safety School Bus



Commodious control space with left side driver's door.

Roomy entrance.

Side step with safety tread.

Ball bearing door control.

Rear emergency door equipped with safety lock.

Clean and sanitary.

Forward facing seats on steel frames spaced to give ample leg room.

Entirely upholstered in genuine leather.

Bodies furnished in two sizes; to seat 33 or 39 children.

HERE is the first transport unit produced in the automotive industry which gives complete, constant, dependable protection to children going to and from school in buses. In this superbly engineered Superior School Bus Body children are as safe as they would be at home or in school.

Body frame work, floor and side paneling are built entirely of steel. The roof is of strong arched steel construction with a monitor of Masonite supported by strong, steel ribs. All windows and the windshield are of shatter-proof glass. It is not possible to make a body more completely fire-proof, splinter-proof or shock-proof.

All members of the body frame work are securely welded together and the steel is disposed to offer the maximum resistance against crushing forces. In this frame work there are no bolted joints to work loose.

The majority of school bus casualties are caused by wood and glass splinters — in this safety body there is nothing that can splinter. Ample ventilation is secured through two adjustable roof ventilators of approved bus type supplemented by two front quarter ventilators controlled by the driver. Side windows permit individual adjustment for opening.

Here is a school bus as clean, as comfortable and as safe as a steel Pullman car, with all the fine, fleet appearance of the most modern highway coaches.

Standard equipment includes brilliant dome light, front and rear marker lights, windshield wiper, non-glare rear view mirror, entrance door grab handle and strong rear bumper.

This Superior Body may be mounted on any popular light truck chassis approximating 160 in. wheelbase and is sold, delivered and serviced by your own selected local automobile dealer.

1. *All-Steel*
2. *Fire-Proof*
3. *Shock-Proof*
4. *Non-crushable*
5. *Shatter-proof glass*
6. *Splinter-proof*

1. *Strength*
2. *Lightness*
3. *Comfort*
4. *Fine appearance*
5. *Long life*
6. *Low cost*

Conspicuously lettered "School Bus", both front and rear.

SUPERIOR BODY COMPANY

LIMA, OHIO

SUPERIOR « » Bodies

(Concluded from Page 94)

the maintenance, custodian, secretarial, educational, office, and board-of-education associates of the school system. A part of the program was given over to congratulations to Dr. Richeson by the teaching staff on the close of his five years of school leadership of the school system.

♦ Mr. Uriah J. Hoffman, 75, assistant state superintendent of public instruction of Illinois, died on January 25, following a long illness. Mr. Hoffman was well known in educational fields for his studies of rural-school systems and for his contributions to the standardization of country schools in Illinois and the middle west.

♦ Mr. F. H. Gilliland has been elected superintendent of schools at Devils Lake, N. Dak., for a three-year term.

♦ Supt. I. W. Smith, of Great Falls, Mont., has been reëlected for a three-year term.

♦ Mr. William Gellerman, of Renton, Wash., has been elected superintendent of schools at Kent.

♦ Mr. L. C. Wright, for the past eight years superintendent of schools at Kent, Wash., has announced his retirement at the close of the school year.

♦ Mr. Einar W. Jacobsen has recently been appointed assistant superintendent, in charge of the elementary schools of Oakland, Calif. Mr. Jacobsen takes up his new work on July 1. He is a graduate of the University of California and has been a member of the public-school faculty for the past eleven years. He served for four years as executive secretary to the superintendent of schools.

♦ Supt. Wm. E. Hoffman, of Mahnomen, Minn., has been reëlected for a sixth consecutive term.

♦ Dr. Merton E. Hill, principal of the Chaffey Union High School, Berkeley, Calif., has been appointed professor of education in the University of California. The appointment becomes effective on July 1.

♦ Supt. Harold F. Dow, of Swampscott, Mass., has been elected head of the school system at Danbury, Conn., succeeding F. K. Watson.

♦ Supt. C. W. Crandell, of Monroe, Mich., has been reëlected for another year, after completing five years of service.

♦ Supt. R. H. Brown, of Virginia, Minn., has been reëlected for another year.

♦ Supt. A. E. Highley, of Lafayette, Ind., has been reëlected for a new term of five years, beginning with August, 1931. Mr. Highley has completed eight years of service.

♦ Supt. W. K. Keller, of Juneau, Alaska, Republican candidate for Commissioner of Education, was successful over Supt. A. E. Karnes of Ketchigan. Mr. Keller has been in the school service for ten years, two as superintendent at Fairbanks, and eight years as superintendent at Juneau. He assumed his new duties on March 1.

♦ Mr. Harold C. Hunt has been elected superintendent of schools at St. Johns, Mich., to succeed F. P. Buck. Mr. Hunt was formerly principal of the St. John High School and holds a master of arts degree from the University of Michigan.

♦ Supt. K. P. B. Reishus, of East Grand Forks, Minn., has been reëlected for a third consecutive term.

♦ Supt. B. A. Winans, of Livingston, Mont., has been reëlected for a new three-year term.

♦ E. A. Spauling has resigned from the superintendency of the Muscatine, Iowa, schools, the resignation to become effective in the fall.

♦ Supt. H. P. Shepherd, after six years' service, will sever his connection with the Knoxville, Tenn., schools on July 1, 1931. His successor has not as yet been chosen.

♦ Dr. Gustave Straubenmuller, retiring associate superintendent of schools of New York City, was given a testimonial luncheon by his associates and friends in the teaching profession at the Hotel Astor, on January 24. Among the speakers at the luncheon were Mayor James Walker; Lewis A. Wilson, assistant state commissioner of education in charge of vocational education; Dr. George J. Ryan, president of the board of education; Dr. William J. O'Shea, superintendent of schools, and Edward Mandel, associate superintendent of schools.

♦ Mr. Slater Bartlow, who was recently appointed director of vocational rehabilitation in Indiana, has resigned from the superintendency at Huntingburg. Mr. Bartlow is succeeded by Mr. G. H. Traw.

♦ Mr. J. R. Houston, of Aurora, Ind., has been elected superintendent of schools of Dearborn county, to succeed Mr. G. C. Cole, who has become state superintendent of schools.

♦ The school staff of the Akron, Ohio, schools has been reorganized, with the elimination of one of the two assistant superintendencies. Under the plan, Mr. R. H. Erwine will be transferred to the principalship of the Central High School. Mr. C. J. Bowman, formerly at the Central High School, has been made principal of the new Buchtel High School.

♦ Mr. L. M. Thurston, for four and one-half years superintendent of schools at Perry, Mich., has accepted the position of assistant superintendent and treasurer at Ann Arbor.

PASSING OF M. G. CLARK

Melvin G. Clark, for more than twenty years superintendent of schools at Sioux City, Iowa, died suddenly on February 5, following an attack of heart disease. Mr. Clark was 62 years old.

Mr. Clark, who was born in Belleville, N. Y., was a graduate of Union Academy, Oswego Normal School, Greer College, and held degrees from Chicago University and Buena Vista College.

Mr. Clark went to Sioux City in 1911, from Streator, Ill. In April, 1930, he was reëlected for another three-year term, which would have expired in June, 1933. He was active in state, as well as national school circles, and was vice-president of the Department of Superintendence in 1924.

Durabilt Announces School Furniture Brown As Standard Finish for Lockers

DURABILT RECESSED CORRIDOR LOCKERS, AUSTIN HIGH SCHOOL, CHICAGO, ILL.

This Popular Color at No Increase In Cost Over Olive Green

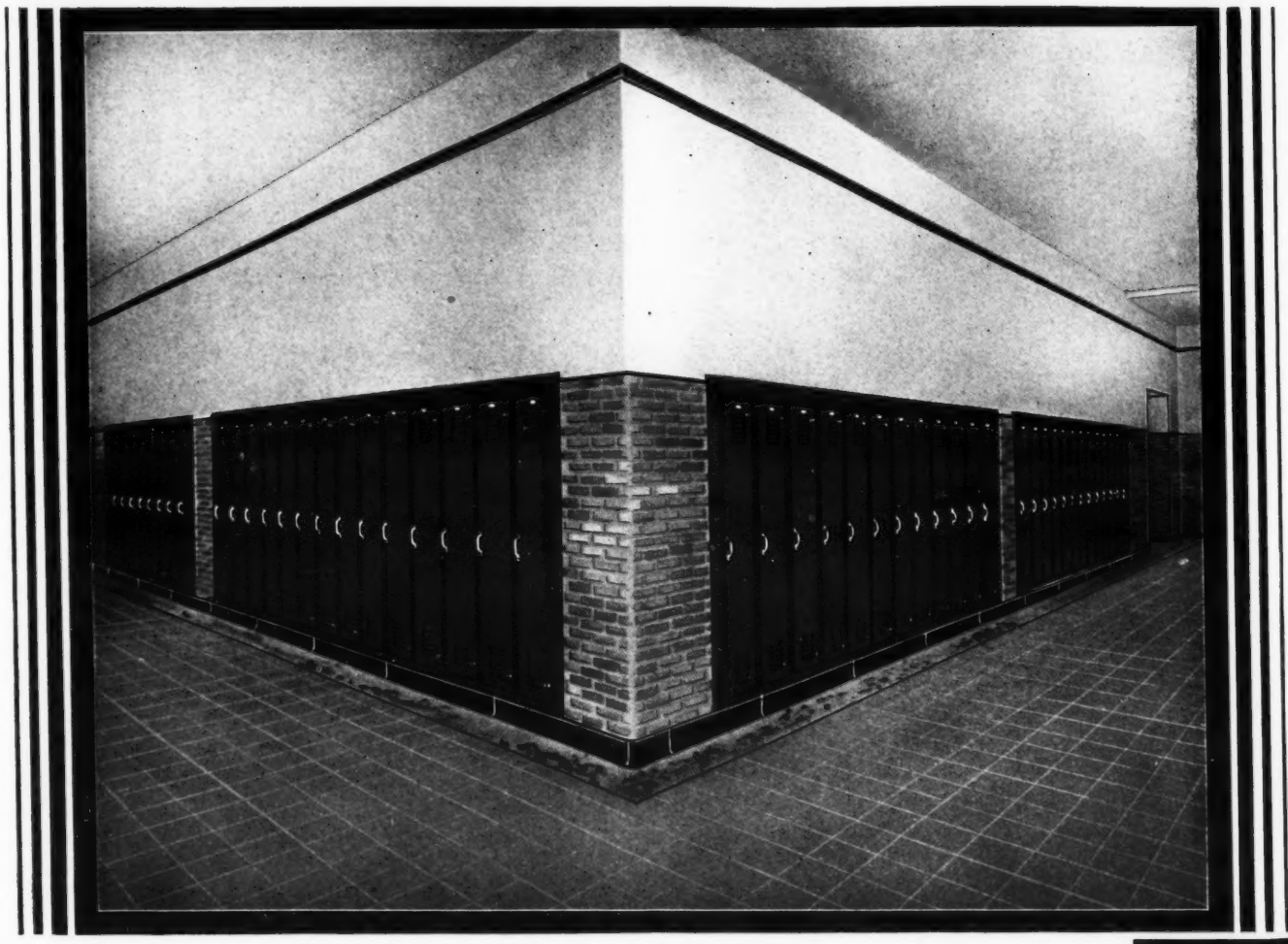
Modern trends in decorating School building interiors are leaning decidedly to color combinations of creams, buffs, and browns. Depressing black has long ago been discarded and its successor, olive green for steel lockers and school furniture, has been losing favor.

These progressive and popular trends have been sensed by the Durabilt Organization of "Locker Specialists" and as a result of hundreds of studies and color experiments, we are pleased to offer Durabilt No. 425 Walnut (School Furniture) Brown as a standard locker color.

This beautiful shade can now be furnished on Durabilt lockers and at the same price as for our No. 307 "Satin Texture" Olive Green or our No. 213 Gray. Request your Architect to specify this shade in his color scheme for your schools. We will gladly send color plates in either of the three above mentioned standard colors without obligation to you.

DURABILT

Beautify Your Corridors the Durabilt Way



CORRIDOR VIEW
AUSTIN HIGH SCHOOL, CHICAGO, ILL.

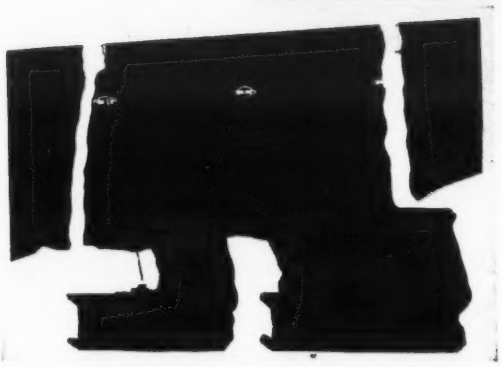
AN IMPORTANT feature in connection with a Durabilt installation of recessed lockers is the new and improved type of Top and End Finishing Strips which are used as trim to close the space between the lockers and surrounding walls.

There are no exposed bolts or screws to mar the appearance of Durabilt Finishing Strips. In fact, with their smooth enameled finish they rival the building's finest wood or marble trim.

The accompanying illustrations show, in an admirable way, how Durabilt Recess Finishing Strips materially improve the appearance of corridor locker installations. They add the "finishing touch" and are indispensable as a part of the decorative scheme in those buildings where recessed lockers are a requisite.

When plans and drawings for your building are in the formative stage, the assistance of a Durabilt Engineer will be of inestimable value. He can assist in working out the best arrangement to meet your requirements and give technical information on those details that will insure a permanent and satisfactory locker installation.

Before you buy any lockers, be sure the samples you consider have the trim attached for your inspection and comparison.



Attractive Finishing Strips.

Durabilt finishing strips project ⅜" in front of the face of the locker. The edge of the top strip adjacent to the locker being offset ⅛"—that is, to overlap the locker ⅛", the overall width being 3⅛" and projecting 3" above the locker. End strips do not have ⅛" offset but do have ⅜" projection. All recess finishing strips have ⅜" return at outer edges.

The above illustration shows how concealed joint clips are used to engage top and end strips or adjoining top strips. This entirely eliminates unsightly screw heads on exterior surface. When these joint clips are engaged there is a spring contact holding the recess finishing strips in alignment with a smooth, flush butt joint making a finishing strip that is as free from exposed screw heads as any of the trim which is used in the building.

Durabilt Finishing Strips are by far the neatest and most attractive ever furnished for recessed locker installations.

"No better built than Durabilt!"

You Can Dispense with Corridor Waste Baskets

WASTE LOCKER IN CORRIDOR
AUSTIN HIGH SCHOOL, CHICAGO, ILL.

Durabilt Waste Locker

This illustration displays the interior arrangement (large locker at right shows exterior) of a standard Durabilt Waste Locker. The locker is usually 24" wide by 15" deep, and same height as the corridor lockers.

The removable waste can is 30" high and the hopper arrangement guides waste into can. A hinged and weighted flap closes waste opening which is approximately 6" high by 8" deep in locker door. Waste lockers can be perforated for attaching to ventilating stacks, or air ducts as shown in this interior view; or, furnished with standard louvres in doors for natural ventilation as illustrated in corridor view above.

IN MANY of the newer school buildings in various localities, the unsightly portable waste paper receptacles have been eliminated at the suggestion of school officials and architects who are familiar with the advantages of recessed waste lockers installed in corridor walls.

As many of the waste lockers as required to meet the demands of each building can be recessed in the walls right with the lockers where they are always accessible to every pupil and at a definite location. Upkeep expense for repairs and replacements of such equipment is reduced and extra work for Janitors is kept at a minimum when Durabilt Waste Lockers are installed.

Waste lockers are just one of the many refinements and niceties the Durabilt Organization of Locker Specialists is able to work out for use in Schools. Fire hose lockers as well as lockers for protecting fire alarm boxes, switch boxes, vacuum cleaner hose, etc. are just a few of the special uses of Durabilt Steel Lockers.

Take advantage of the valuable assistance we are in a position to offer. Our years of experience in solving locker problems is available to interested school officials and architects without obligation. When planning your building we hope you will feel free to call on us for suggestions in connection with your storage requirements. This service will place you under no obligation.

Consult Our Specialists on Your Locker Problems

Brighten Your Gym Rooms with Durabilt Walnut Brown Lockers

GIRLS GYMNASIUM LOCKER ROOM
AUSTIN HIGH SCHOOL, CHICAGO, ILL.

A Soft, Pleasing Color

OFTENTIMES as a result of the wrong selection of color for the lockers, gymnasium locker rooms are not attractive and inviting.

The girls' gym room featured on this page as well as the accompanying illustrations of lockers installed in the Austin High School, Chicago, Illinois, display in an admirable way what can be accomplished by choosing a bright, pleasing color.

Durabilt No. 425 Walnut (School Furniture) Brown is our new shade for lockers that is now available at no increase in cost over Olive Green. When lockers are furnished in this shade, all exposed bolts, nuts and handles are Udylite finish. Number plates are solid brass, Butler nickel finish with black numerals.

More pleasing color combinations can be arranged when lockers are finished in this harmonizing shade of brown. You will find that it is a comparatively simple matter to decorate your rooms and corridors when selecting tile, bricks, linoleum, wall paints, etc. to match this attractive, bright color.

We have prepared 3x5″ steel color plates in this beautiful shade of No. 425 brown which are now available to any who request them. A very comprehensive brochure entitled "Solving Gymnasium Storage Problems", and a copy of our 14-page locker folder No. 6000 are yours for the asking.

If your plans and specifications are now ready, send them to us for a quotation on Durabilt Steel Lockers finished in the new School Furniture Brown. If you are contemplating a new school or the remodeling of an old one, let us help you lay out a locker system that will give the utmost satisfaction at the minimum cost. Phone our nearest Sales Office or write us direct at Aurora.

DURABILT STEEL LOCKER CO.

SALES OFFICES IN ALL PRINCIPAL CITIES

400 ARNOLD AVE., AURORA, ILL.

School Administration Notes

SCHOOL TRANSPORTATION COSTS IN CALIFORNIA

The gradual displacement of the small, usually inadequate rural school by the consolidated school has brought to school boards of the country another problem, that of providing and paying for child transportation.

The U. S. Office of Education, in a bulletin on "Factors Affecting the Cost of School Transportation in California," prepared by Frank O. Evans, director of administrative research in the Los Angeles schools, has presented data which will be of help in solving the problem of school transportation costs.

The pamphlet brings out that, in comparison with other states, California transports its school children longer distances. Approximately 26 per cent of the high-school pupils live more than ten miles from their school. The average student pays $41.35 a year bus fare to and from school, while the cost for the same privilege to the average elementary-school pupil is $28.86 a year. A school bus in the Pacific Coast state makes a daily trip of 37.7 miles on the average, and carries an average load of 30.6 pupils. The expenditure for school transportation has come to occupy third place in the budget of union schools in the state, and amounts to 11.5 per cent, of the total current expense.

The present large expenditures, said Dr. Evans, appear to be justified both as to economy and as a means of enlarging the educational opportunities of more than 30,000 children in the state.

Dr. William John Cooper, Commissioner of Education, commenting on the subject, said: "In order to equalize the opportunities for children, some effort has been made to increase the size and the wealth of the unit for school administration, and to establish consolidated schools, to which children may be transported. The transportation business of school boards involves an expense element of such magnitude that every reasonable effort should be made to reduce its cost."

MOVABLE SCHOOL FURNITURE

"There are many reasons why movable furniture is more desirable than stationary furniture for the schoolroom," says Principal Edith M. Northrop, of the Town of East Lynne, Conn.

"First, and perhaps most important is the fact that by means of movable furniture the ordinary schoolroom can be changed into a playcourt in a twinkling by pushing the chairs close to the walls — a great advantage on a rainy day.

"Then movable seats may be so easily arranged for group work. Four seats pushed together form an excellent large table, with a pupil on each side. This permits children having the same interests or nearly the same mental ability to work together.

"When the number of pupils in a room grows less, the vacant chairs may be removed, leaving more space for the remaining pupils. This, however, suggests one of the disadvantages of this type of furniture, for school boards will sometimes crowd as many pupils as possible into a room and thus save hiring a much-needed teacher.

"There are many advantages from the standpoint of health. Movable seats may be placed where each pupil can with the least eyestrain see what is being done in other parts of the room. Also, if a pupil must be moved during the year from one class to another, his seat may be moved with him, which is a great advantage. If contagious disease is discovered, the furniture belonging to the pupils affected may be removed and properly cared for. In case of fire, movable furniture can often be saved where stationary furniture could not.

"The floor is much easier to keep clean where movable furniture is used. Even the most conscientious janitor finds it difficult to keep the floor clean when the furniture is fastened down. Where the janitor is somewhat lax in his cleaning the alert teacher will see that the furniture in her room does not cover the same space each night.

"If a pupil is given at the beginning of the year a seat which he is to keep the entire year, no matter where he may be changed in the classroom, he will have a certain amount of pride about the looks of it and the furniture will be kept in better condition."

ADMINISTRATION

♦ The Kansas Teachers' College, of Emporia, Kans., has recently reported the thirteenth pupil scholarship contest conducted in December in 873 high schools in Kansas and in 41 other states.

The Indiana new type tests were used in 84 of the 92 counties and in many of the school terms. Mr. R. H. Longfield, superintendent of schools of St. Joseph county, acted as chairman of the committee of county superintendents responsible for the distribution of the tests. Dr. W. W. Wright, of Indiana University, coöperated in their preparation.

♦ The Indiana Schoolmen's Club, on February 7, will hold a joint meeting with the Indiana City and Town Superintendents' Association. The general theme of discussion will be "School Finance." Mr. C. R. Maxam is president of the club.

♦ An investigation of methods of state administration of schools has been recommended by Dr. William John Cooper, United States Commissioner of Education. The study would be financed by some educational foundation and would be carried out under the direction of outstanding experts in school administration and political scientists. The Commissioner declared himself in favor of the cabinet system of direction by the states, with the governors holding major control over the expenditures.

♦ A recent report of the state education department of North Carolina shows that 185,000 children were enrolled in standard elementary schools of the state during 1929–30. This number was more than a third of the total white elementary enrollment for that year. Of this number, 102,507 were rural children, and 82,384 were children in charter school districts.

The report showed that in 1924, there were 270 rural schools with seven or more teachers and an eight months' term. Today, there are 448 rural schools who meet these requirements. In 1924, there were 62 large rural schools in which all the teachers had a minimum of one year of college or normal training. In 1929–30, there were 406 rural schools employing teachers with the required training.

♦ Eau Claire, Wis. A school for crippled children has been opened, with an enrollment of 21 students. The school is housed in a part of the County Training School building.

♦ The American Library Association, Chicago, Ill., in a recent statement, points out that there are between 15,000 and 20,000 high schools in the United States without library facilities, as compared with more than 3,000 in which some type of library service is available. Many high schools, it is expected, will establish or improve their library service during 1931, in order to meet the requirements for accredited standing set by the accrediting associations. The work is being stimulated through grants from educational foundations for aiding the development of library service in all types of schools.

During 1930, considerable interest was centered in the South, where 898 high schools in 11 states faced the necessity of meeting new library standards. It is expected that in 1931 some 2,500 high schools not now accredited will strive to meet the standards.

Schools in the North and West will be confronted with a need for extending library service when the new revised standards are in effect.

♦ The first meeting of the Educational Research Association of New York State was held recently at Syracuse, with 147 persons in attendance. The purpose of the association is to encourage and promote educational research through publications, meetings, investigations, and like means of coöperative endeavor.

At the business session, the association adopted a constitution and elected officers for the coming year. Dr. W. W. Coxe, of Albany, was elected president; Dr. Harry P. Smith, of Syracuse, vice-president; Mr. A. L. Maxon, of Schenectady, secretary-treasurer; and Dr. J. E. Butterworth, Ithaca, and Dr. Ralph Walter, New Rochelle, directors.

♦ Anacortes, Wash. A visual-education room has been installed in each school building in the city. The visual-education library which is cataloged, is under the direction of the secretary to the superintendent of schools. Teachers are encouraged to take out lantern slides and films, which must be returned promptly after they have been used.

♦ Under new standards set up by the State of Washington, a trained librarian must be employed in high schools of a certain size, beginning with the school year 1931. The rules call for a college graduate, with some teaching experience, and with one year training in an approved library school.

♦ A relief fund for needy children was recently raised at Anacortes, Wash., by the teaching staff of the city schools. A Christmas program with faculty members on the cast was given. The admission consisted of a piece of clothing, or an article of food. In addition, the members of the faculty have contributed an average of $2.50 per

(Concluded on Page 104)

PUBLIC SCHOOL 102, THE BRONX, NEW YORK CITY

Short time and double sessions are being reduced materially in New York City due to the rapid completion of elementary school buildings like the above Public School 102, Bronx, which was opened in February. The building was designed by the Bureau of Construction and Maintenance of the Board of Education and cost $707,000. It is one of eleven elementary buildings and one large high-school building which were opened in February and which added more than 15,000 seats to the school accommodations of the city.

(Concluded from Page 102)

month each to the promotion of relief work. The money is being used to provide milk, shoes, food and clothing for needy children of the unemployed.

♦ Supt. G. W. Greene, of Anacortes, Wash., has begun an experiment to determine the most suitable table top for use in high-school classrooms. The present study had for its inception the belief that flat-top tables did not constitute proper equipment, and that a natural slant would be more in conformity with the slant which has been developed in desks in recent years. In his study, Mr. Greene has taken advantage of the library tables developed by President Fisher of the Bellingham Normal School, which have won the approval of leading oculists.

♦ The school district of Millard county, near Fillmore, Utah, has been enlarged in aim and scope through consolidation and transportation of students to central schools. The district covers 6,600 square miles of territory. Where five years ago, the district had 8 one-teacher schools and 6 two-teacher schools, there are now no two-teacher schools, and 4 of the one-teacher schools have been eliminated.

Under the transportation system, elementary pupils are transported distances ranging from 2 miles to 19 miles, and high-school students a distance of 25 miles. The school busses travel approximately 12,000 miles a month, and are owned and operated by one man under a blanket contract. The district has entered upon its fourth year under the present form of transportation service.

♦ Wausau, Wis. The junior and senior high schools have recently been equipped with radio receiving sets for giving radio programs in the schools.

♦ Under the direction of Mr. J. H. Rohrabugh, superintendent of schools of the Clark District, Harrison county, W. Va., the school system has made substantial progress. At the time of Mr. Rohrabugh's appointment in 1929, a survey of the schools was made, with the result that only one building secured a first-class rating, and one of the largest schools failed to make a third-class rating. A year later, following a second inspection, the school with the lowest score was found to have a rating of 93 out of a possible 100 points. All of the schools in the district have made rapid advancement during the past year.

♦ .The Dalton plan of individual instruction has been very successfully used in Public School 39, the Bronx, New York City, during the past seven years. According to Prin. Regina C. M. Burke, the Dalton program has proved a very decided step forward in elementary education. Not only have the children benefited scholastically, but they have gained in personality and in self-reliance. They have gained in social behavior, in ability to conduct their own affairs, and in ability to meet new situations quickly and wisely. The children of both the bright and dull groups seem to possess unusual power to concentrate on the work before them.

During the free work, or study period, the children are permitted to work in any room or laboratory, at any assignment for any period of time, except that the work for any month cannot be commenced in any subject until all the assignments in all the subjects are completed for the previous month. Class, individual, and group conferences are held. Attendance at the conferences is compulsory.

The experiment was begun in September, 1923, with seven teachers in charge of the program, directing the activities of children of the 4B, 5A, 5B, 6A, and 6B grades.

♦ A system of accrediting grammar-school pupils with units of work instead of the present system of grades has been worked out at Cleveland, Ohio. The system is designed to permit students to advance as rapidly as their qualifications permit and to eliminate failures. It divides the nineteen elementary subjects taught into work sheets, which when solved, entitle the student to a unit. The system has been installed in the city's curriculum centers and is being extended to other elementary schools.

♦ Regrouping of students in the second and third grades of the South Ward School, Waupun, Wis., according to ability, has been planned by Supt. H. C. Wegner. There are a number of unusually slow pupils, as well as a number of unusually bright pupils, who are interfering with the work of the other pupils. Under the plan, the students will be divided according to ability, as indicated by tests plus the individual opinions of the teachers.

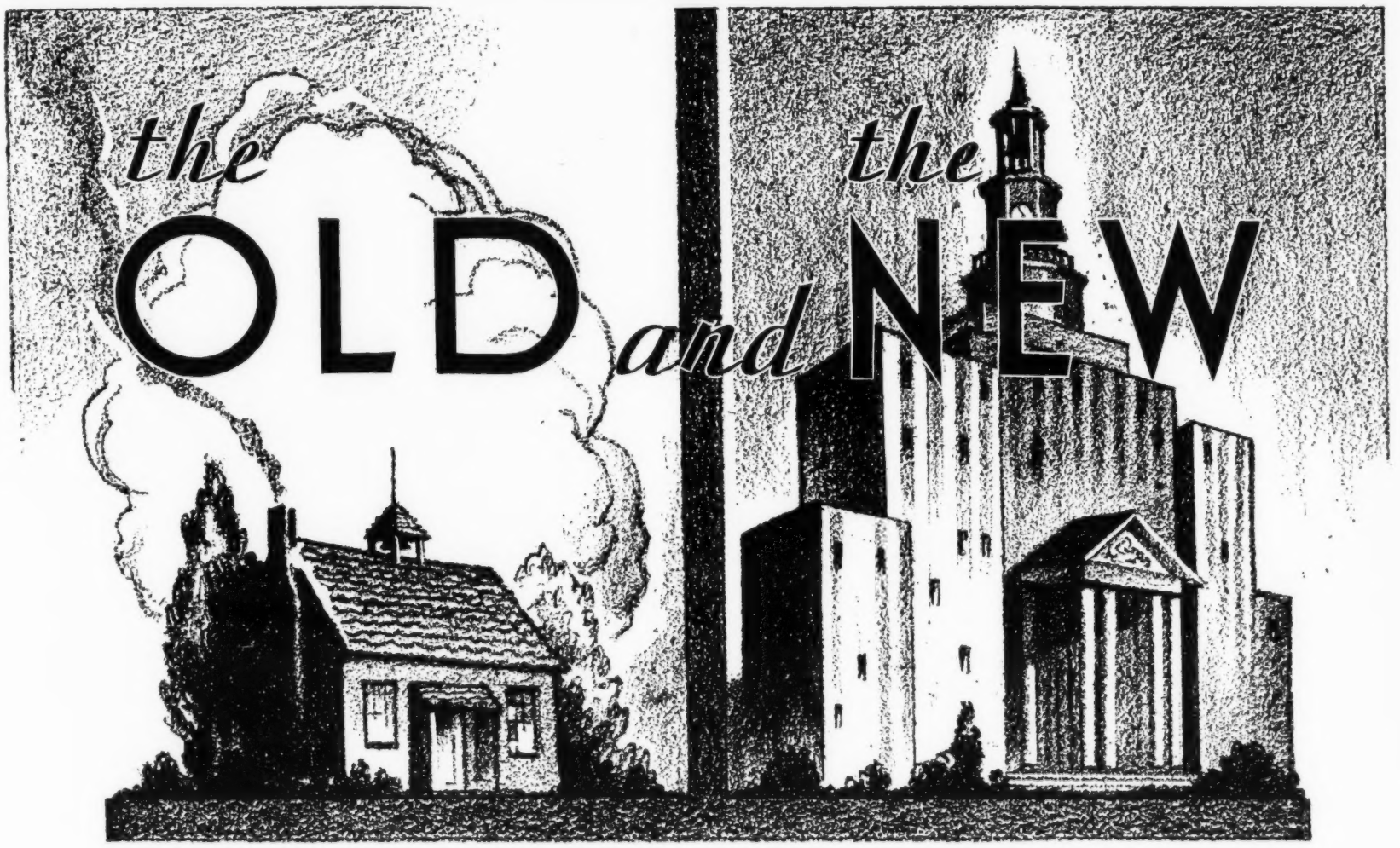
♦ Fremont, Ohio. The high-school building has been wired for radio programs. Loud-speakers have been installed in the rooms, study halls, and auditorium. The radio set will be stationed in the superintendent's office, with speakers operated from a board in the office.

♦ Maysville, Ky. A change has been made in the grade card of the Washington High School. The new card contains the complete record for the semester, and indicates certain traits.

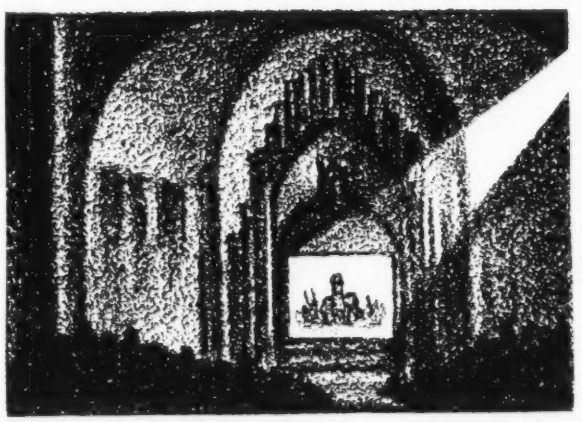
♦ Winona, Minn. A system of special-help rooms for retarded pupils in the grade schools has been put into operation with the opening of the second semester. Under the plan, one teacher at each school devotes her entire time to pupils selected for the room. Such teachers are required to have special training and receive higher salaries. The action followed a report of a survey made last year, which showed that 61 school children are retarded two years or more, while 302 are retarded at least a year.

♦ Kelso, Wash. Beginning with the second semester, the high school has inaugurated a system of supervised study. Under the plan, the school day is divided into six periods of one hour each. The first thirty minutes of the period are used for recitation, and the second thirty minutes for study. The morning session starts at 8:45 and closes at 11:45. The afternoon session starts at 12:30 and closes at 3:30.

♦ With the opening of schools for the second semester, the high schools of New York City housed more than 6,000 students in each of nine high schools, thus taking care of more than 186,000 boys and girls who had enrolled for the semester. The largest was the DeWitt Clinton High School with over 9,400 boys. The Flushing High School went on part time for the first time, while the Lincoln High School was forced to use double sessions. The Haaren High School with 4,600 students, had a gain of about 1,000.



THE FABULOUS FORCES OF THIS ELECTRICAL AGE HAVE WROUGHT A MIRACLE IN EDUCATION



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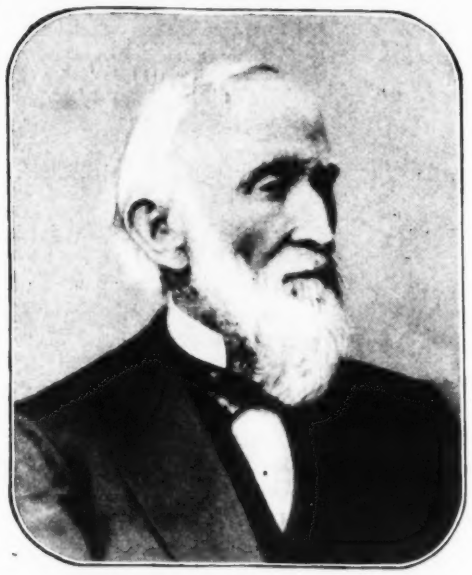
Book News and Reviews

A CENTURY OF WEBSTER'S DICTIONARY

It was in 1831 that the Merriam Brothers, George and Charles, founded a print and book shop out of which grew the publication of school textbooks and Noah Webster's dictionary. While the dictionary made its original appearance in 1828, it was not until 1843 that the G. and C. Merriam Company acquired the publication rights for it.



GEORGE MERRIAM

The purchase of Webster's book by the Merriams (including the unsold edition and the publishing right) marked an alliance of business and scholarship which since 1847, when the full work, revised and reëdited to suit the public's wants, was brought out in one volume, has never lost public favor. The Merriams had entered upon a long and steadily successful career of dictionary making.

In 1850, it was proposed in the Massachusetts legislature that a copy of Webster's large dictionary be placed in every district school. Soon after, New York state placed 10,000 copies of Webster's dictionary in its schools and thus began its country-wide acceptance as a school

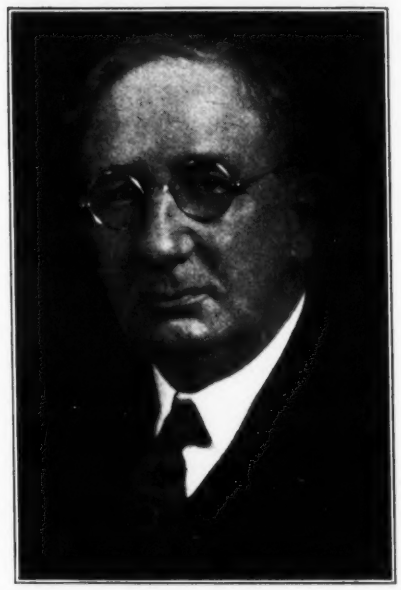
CHARLES MERRIAM

standard. In 1859, the Merriams introduced for the first time in any dictionary, supplementary sections of classified illustrations, new words, tables of synonyms, features now recognized as essential to a dictionary.

Merriam's Webster has gone through a series of revisions in which some of America's most eminent educators collaborated. While the volume grew in size it also grew in importance. It became the accepted standard in dictionary literature.

The founders of the company, George and Charles Merriam, later took into partnership their younger brother, Homer Merriam. In 1877, O. M. Baker, trained as an educator and a school superintendent, and later as a representative of one of the largest schoolbook publishers in the United States, entered the concern, and an experienced and able bookseller, H. C. Rowley, came in two years later. The business was incorporated under Massachusetts laws as G. and C. Merriam Company, on April 10, 1892. Homer Merriam retired from the presidency in 1904. The present president of the company is A. G. Baker, son of O. M. Baker, who succeeded H. C. Rowley's retirement in 1922. For a number of years past, the active management of the company has been intrusted to A. G. Baker and R. C. Munroe, secretary of the company.

The fine traditions which have characterized the Merriam enterprise through all the earlier years of its establishment are continued to this very day. The Merriam policy, which has kept the Webster dictionary abreast with the needs of every period of its existence, and holds to the highest standards of service, is religiously observed by those now intrusted with the enterprise.



A. G. BAKER
President of the G. & C. Merriam Co., Springfield, Massachusetts

The story of the Noah Webster dictionary, noting the successive stages of development from a small beginning to a monumental document, is also the story of the G. and C. Merriam Company. Therefore much importance attaches to A. G. Baker and R. C. Munroe, who at present are guiding the destinies of a great historic publishing house, and whose constant effort is to produce the best dictionary for use of the English-speaking public.

Upon the hundredth birthday of the G. and C. Merriam Company we extend our sincere congratulations!

The Choice of Textbooks for Elementary Classes in Foreign Language[1]

Dr. C. E. Young, University Extension Service, Milwaukee, Wisconsin

It is not the purpose of this paper to make favorable or unfavorable comments on any specific textbooks. The attempt is rather to offer some suggestions as to what to avoid, as well as what to look for, in selecting texts for elementary foreign-language classes. The following are some of the factors which school authorities should take into account in making such selections. It is assumed that the teacher involved has the privilege of making the choice. All that one can say is that teachers who must use books selected by others must adapt themselves to the text as well as possible, and they must make the best of the situation.

Books Should Be Adapted to Type of Class

A teacher should first decide if the text under consideration is in accordance with, or adapted to his or her own previous training, temperament, and experience. A teacher naturally feels more comfortable when using a textbook with which he or she is in sympathy. A teacher should next consider the type of class in which the book is to be used. Books suitable to young students are frequently a bore to older students. One must also consider the length of the course and the principal objectives. If the course is to be a long one, a book which makes slow and gradual approach to the subject, with some attention to details, may be used; but if the course will be a short one, the approach to the language must be made quickly without regard for details. In like manner, the teacher must select a book fitted to her principal purpose in teaching. A book which is intended primarily for the development of oral-aural skills may not be best suited to the rapid development of reading ability. The teacher should, of course, read with care the preface and introduction to the textbook to discover what the author or the publishers believe is its purpose. If the author or publishers claim too much for a text, it is a book to be regarded with suspicion. In spite of the claims frequently made, few texts are really well suited for all types of classes. Beware especially of the text for which extraordinary claims are made! No text will ever accomplish some of the things which authors occasionally claim.

Types of Books

Of course, two types of books must be considered. In addition to the basic text which may be called either a grammar or a lesson book, texts for reading must be found. One of the great mistakes made in the choice of reading texts is in selecting material that is too difficult for the linguistic powers of the student, or which deals with matter outside his age and experience. A teacher frequently makes the error of choosing for an elementary class a text which he enjoyed, forgetting that what may seem reasonably easy to him will appear very different to beginners.

A new type of text for which teachers must be on the lookout and should examine carefully as samples are brought out, is the text simplified by keeping the vocabulary within words of the highest frequency, as established by recent word counts. Such texts are already on the market and there are others in preparation. The principle on which these texts are built involves the introduction of new words gradually; one new word is introduced to every forty to sixty run-

(Concluded on Page 109)

[1]A paper presented at the Annual High-School Conference, University of Illinois, Urbana, November 21, 1930.

(Concluded from Page 106)

ning words of the text. This new form of editing places in the hands of beginners interesting reading matter, which otherwise could not be read until the third or fourth semester. If a student finds that he can read rapidly large amounts of text, without constantly stopping for new words, his interest in the subject is likely to be aroused rather than discouraged.

A much debated question is the amount of exercise material with which textbooks should be provided. Some teachers through lack of experience, time, or interest do not care to make up any exercises of their own. For such teachers texts well supplied with exercises are a godsend. On the other hand, the teacher who likes to make up exercises frequently does not care to use those provided in the text. A teacher must decide whether or not a text can be used mainly as a vehicle for linguistic exercises. If this is the case, it is difficult to see how the student can be interested in the story told by the text. The writer remembers with pleasure his professor of Greek, who began a class in Homer by stating he would not make Homer a vehicle for Greek grammar. He urged that students in the class who wished to study the details of Greek grammar and composition elect the courses in which these subjects were studied.

Mechanical Features of a Book

Teachers should, of course, pay attention to the mechanical features of a text, such as the quality of the paper, the binding, the illustrations, and the type. The writer has in mind one text in particular, whose efficiency is greatly reduced by the fact that the exercises are set in small type, with lines very close together. The purpose of the publishers was evidently to save space, but when they crowd the material in this way and leave half or even two thirds of a page blank, it is difficult to see how they have saved anything. Ink is certainly cheaper than eyesight, and the text which economizes in this way ought to be given small consideration.

In conclusion, school authorities ought always to examine texts personally and carefully. They should not rely on a catalog description, or the "sales talk" of a traveling representative.

BOOK REVIEWS

Washburne's Individual Arithmetic

By Carleton Washburne, Emma J. Koepke, Clauda R. McAfee, and Frieda Barnett. Paper, twelve books, two correction books, two textbooks, and teacher's manual. Price, 40 cents each. World Book Company, Yonkers, N. Y.

At first glance, the size and number of these books is forbidding, and the reviewer wonders how any school can teach as much arithmetic as they include for the first six years of the child's school life. A closer examination of the books then reveals that the series is a most carefully and painstakingly complete text-, work-, and testbook, with ample material for reteaching children who are slow and who develop typical learning difficulties. There is repeated evidence in each of the books that practical teachers working under typical classroom conditions have developed the material as a whole, have included many interesting and distinctly practical lesson arrangements, and have made numerous and very human applications to child life, family situations, and community life.

No less interesting than the general method of the books is the possibility of adapting them to varying school conditions where the activity method can be used, or where teachers insist upon older and more rigid types of teaching and recitation. The books are evidence of the fundamental correctness of developing the content and the method of present-day textbooks on the basis of classroom rather than laboratory experimentation.

Problems in Educational Psychology

By Walter J. Gifford and Clyde P. Shorts. Cloth, 728 pages. Price, $3. Doubleday, Doran & Co., New York, N. Y.

This volume consists of a series of connected readings for the beginning student in educational psychology. The material is so organized as to form a consistent whole. Throughout the book, principles of educational psychology are related to methods of teaching, while problems and learning exercises are added. There is much that is good in the book when it is divorced from the philosophical tenets and assumptions of the writers. Hence, a serious doubt arises how this organized compilation from a great variety of writers whose philosophical background often differs and is frequently false, can be of directive value to the student. Many educational psychologists have made a false start by assuming that man is only a biological being. With that assumption, they cannot state the adequate objectives of education, nor can they suggest the proper methods and procedures, when the latter are based on biological determinism with its implicit rejection of free will. Complete objectives in education must integrate into a composite and well-balanced program of curriculum, method, and procedure, leaving out no essential element in man. The merit of the book we are reviewing is marred by the false assumptions of many of the writers quoted.

School Accounting by Machine Methods

By Walter W. Kemmerer, Ph. D. Paper cover, 179 pages. Published by W. W. Kemmerer, Houston, Tex.

The author here presents a study of the devices, equipment, and paraphernalia that enters into school account keeping. Thus, he deals with typewriters, bookkeeping systems, calculating machines, addressographs, and the like. He also provides a series of record blanks, tabulating cards, forms, etc., to use with these machines.

Dr. Kemmerer, who is the director of research for the Houston schools, performed this excellent task for the purpose of bringing greater accuracy, expedition, and efficiency into the school-accounting labors. While he has centered his study upon the utilitarian devices which have found recognition in the modern business office, and in the field of banking, he also provides suggestions for basic principles of budgetmaking, purchasing, accounting, payroll procedure, store management and inventory, and routine school-business control that go far beyond mere machine methods. The secretary and business manager will find exceedingly helpful ideas on office management throughout the book.

A comprehensive code for school receipts and expenditures, flexible enough to be used in any size system, is provided. The author also supplies a bibliography of books and magazine articles on school finance and school accounting. Some fifty documents are listed, of which eighteen are credited to the SCHOOL BOARD JOURNAL.

The Vocabulary of Arithmetic

By G. T. Buswell and Lenore John. Paper, 143 pages. Price, $1.25. Bulletin No. 38, January, 1931, University of Chicago, Chicago, Ill. This investigation was made for the purpose of studying the nature and

the development of concepts of technical and semi-technical terms in the arithmetic of the first six grades. The data are presented in three major divisions. The study included such phases as vocabulary difficulties in grades four to six, development of concepts of words in grades one to six, and an explanation of new technical terms. The significance of the study for the teaching of arithmetic and the construction of arithmetic textbooks is presented in chapter six.

Perhaps the heart of the matter is indicated in one brief paragraph. in which the authors argue that, if pupils are to learn the technical terms of arithmetic, the first demand on the school is that it supply a gradually increasing body of experience which will provide a meaningful background for the terms that must be learned. In teaching arithmetic, a working hypothesis may be established if the constant element in the work is to give a clear understanding of the terms and processes of the subject, with the organization and grade placement as variable elements suited to living conditions.

The appendices contain a list of five hundred arithmetical or quantitative terms, which include the terms used in the tests employed in the investigation. and copies of all tests used.

Test and Practice Pad for Second-Grade Arithmetic

By J. W. Studebaker, F. B. Knight, and W. C. Findley. Price, 32 cents. Scott, Foresman Co., Chicago, Ill.

This very complete exercise pad is based on the latest scientific studies in the field of primary arithmetic. Every detail has been adjusted to a well-developed method of teaching, practice testing, reteaching, and special remedial work for children who develop peculiar difficulties. The material is abundant and has been apparently carefully tested under widely differing conditions.

English Essentials

By Teresa M. Ryan and Edwin R. Barrett. Paper, 116 pages. Price, 51 cents. Published by Harcourt, Brace & Co., New York, N. Y.

This is a combined review handbook and drill pad for eleventh and twelfth-grade English classes, covering such phases of English work as sentence structure, and essentials of grammar and punctuation which are necessary in order to understand and master the writing of a correct English sentence. The lessons are arranged for study but not for testing, although they may be used for both purposes. Both the lessons and the exercises accompanying them are based upon an extensive testing program.

The lessons and exercises given are intended to effect a definite improvement in students' English habits by concentrating on the few errors or types of errors which have been revealed as the greatest sources of difficulty by the English tests.

The English test, which is to be used for diagnostic purposes, is a help to the teacher in determining the particular weaknesses of students. It should be taken by the students before they begin work on the lessons, as it is then possible to concentrate on those lessons that treat the difficulties disclosed by the test.

A Second Course in Algebra

By Harry C. Barber. Cloth, 506 pages. Price, $1.40. Published by Houghton Mifflin Company, Boston.

The author of this second-year book emphasizes an understanding of the reasons which underlie the principles and rules of algebra, by a very simple teaching device—the use of Socratic questions introduced as an essential part of the text. The first half of the book presents the minimum course; the second half adds numerous problems and exercises for enriching the work and making practical applications. A most teachable book.

The Wonderful Chair

By Frances Browne. Cloth bound, 197 pages. Price, 76 cents. Published by D. C. Heath and Company, Boston.

The full title of this book is *The Wonderful Chair and the Tales It Told.* It is one in the series of Heath supplementary readers.

"Once upon a time there lived, etc.," is the cozy beginning of each story in a collection of nine stories, that is bound to charm and fascinate children. There are princes and castles, cobblers and shepherds, fiddlers and fishermen, etc.

Crib and Fly

By Chas. F. Dole. Cloth, 76 pages. Sixty cents. D. C. Heath and Company, Boston.

An old favorite dog story reprinted in attractive form.

Three Fairy Tales

By Jean Inglelow. Cloth, 64 pages. Price, 56 cents. D. C. Heath and Company, Boston.

An old favorite in a new type of dress.

The United States Among the Nations

By W. W. Atwood. Cloth, 262 pages, illustrated. Price, $1.32. Ginn and Company, Boston.

This is a geography. Just why the authors do not call it by that name is explained in the fact that this is the fourth yearbook in a new series of geographies, published under the general title of *The Earth and Its People.*

This volume is devoted to the geography of the United States, bringing to the student in a most comprehensive and complete manner, a marvelous fund of information attractively presented. The author explains the causes for the growth and development of the country, the importance of climatic conditions, the national resources, the historic background, and our world relationships.

With this basic plan in mind, the student is carried into the various parts of the country, is told of the production side of things, mode of life, the picturesque and the drab, is shown what this country looks like, and what its people do. Thus the agricultural, industrial, and commercial activities, mines, forests, and fisheries are described.

The book is well equipped with maps, charts, and illuminating illustrations.

Elementary Algebra

By Clinton A. Bergstresser and Elmer Schuyler. Cloth, 530 pages. Published by Hinds, Hayden and Eldredge, Inc., New York, N. Y.

A complete introductory course for high-school classes.

The First Year of Life

By Charlotte Buhler. Cloth, 282 pages. Price, $3.50. The John Day Company, New York City.

A leading Austrian child psychologist here records the findings of a group of trained observers who watched 60 children during the first twelve months of their lives. The book is an accurate, complete statement of beginnings, experiences, and development of the child during its first year when so many happenings occur that have an influence on later life.

Teachers' Manual for Do and Learn Readers

By Margaret L. White and Alice Hanthorn. Cloth, 224 pages, illustrated. Published by The American Book Company, New York City.

This manual suggests definite plans for teaching each of the lessons of the three first-year books of the series. The recommendations for grouping, acticities, and testing are particularly helpful.

Studies and Tests on Vergil's Aeneid

By Florence Waterman. Paper, 122 pages. Published by Harvard University Press, Cambridge, Mass.

The new types of tests are here applied effectively to the Aeneid. Teachers of Latin may well adapt and

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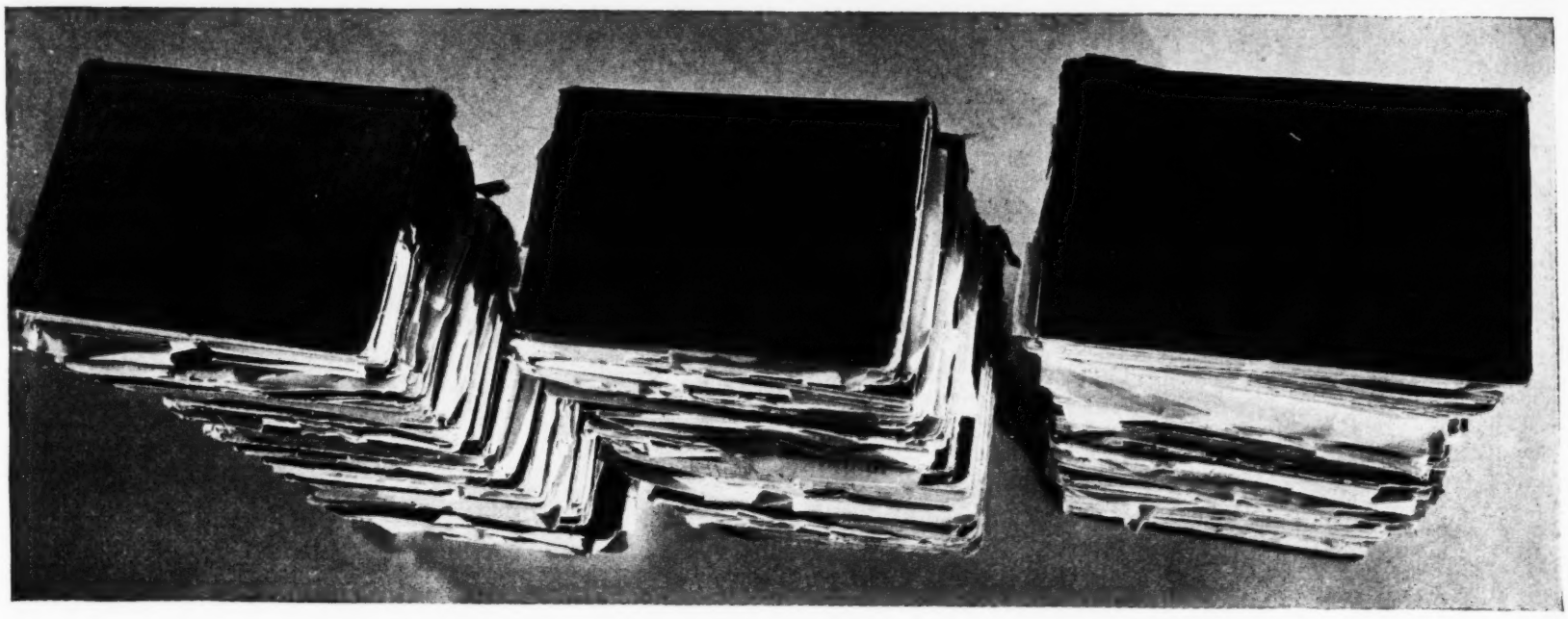

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(Concluded from Page 110)

adopt the author's method of putting educational and remedial teaching values into their routine and term tests.

Workbook in Plane Geometry

By H. D. McIntyre. Loose-leaf. 128 pages. Price, 80 cents. World Book Co., Yonkers, N. Y.

A complete workbook for review and drill.

Everyday Physics

By Carleton John Lynde. Cloth, 578 pages. Price, $1.80. The Macmillan Co., New York City.

The first course, issued in 1914, for high-school use, has been carefully revised to introduce the latest discoveries and theories. The course is well balanced, significant in its application to everyday problems, and teachable.

A Point Scale of Performance Tests

A Clinical Manual. By Grace Arthur. Price, $1.50. The Commonwealth Fund, Publishers, New York City.

This manual makes available a method of selecting and combining the commonly used performance tests into point scales for clinical usage. The author has done for performance tests what Terman did for the original Binet, in providing standardization of available tests so that each rating is in terms of objective standards. Two forms of the scale have been standardized, eliminating the difficulties of retesting with the same set of tests and norms.

PUBLICATIONS

History of St. Louis. By Dena Lange. Bulletin No. 9, Vol. 28, Nov., 1930, of the Public School Messenger, St. Louis, Mo. The pamphlet has been prepared to provide adequate teaching material for use in the schools. Besides the reading matter which has been prepared for pupils in the fourth grade, there is an appendix containing some material for the teachers' use.

Book Film. Through the courtesy of Ginn and Company, a two-reel, standard-size moving-picture film "Your Book," has been made available for use in schools. The picture gives briefly the historical development of bookmaking, a trip through a press, and a lesson on the care of books.

Factors Affecting the Cost of School Transportation in California. By Frank O. Evans. Price, 10 cents. Bulletin No. 29, 1930. Issued by the U. S. Office of Education, Washington, D. C. The purpose of this study was to evaluate the expenditures for transportation of pupils in the State of California. Four objectives were recognized: First, to determine what transportation is costing the state; second, to find means of making cost comparisons; third, to study the variation in costs; and fourth, to suggest forms and means of standardizing the costs. As a result of the study, it was found that the total cost per mile for school busses compares favorably with the type of bus operated by transportation companies. The average cost per mile is low in comparison with costs reported from other states. The greater average distance for pupils transported makes the cost per pupil relatively high. There appears to be a need for the standardization of many items, but the total cost of transportation is not excessive when compared to the available standards. The cost per pupil is less than the differences in total per-capita cost in small schools.

A Nature Bibliography. A reprint from *The Nature Almanac*, published by the American Nature Association, Washington, D. C. This bibliography, by E. Laurence Palmer and Eva L. Gordon, the authors, has been carefully prepared to meet the needs of teachers and schools.

Regulations for the Protection of Openings in Walls and Partitions Against Fire. Issued by the National Fire Protection Association, 85 John St., New York, N. Y. The rules are intended to cover wall openings, fire doors, swinging plate-steel doors, hollow-metal fire doors, openings in corridors and partitions, and openings in exterior walls and partitions.

Washing, Cleaning, and Polishing Materials. Bulletin No. 383, 1930, of the Bureau of Standards, U. S. Department of Commerce, Washington, D. C. This pamphlet discusses briefly the use of water in laundering and includes a description of the general composition of soap, soap-manufacturing processes, and the common varieties of soap products, alkaline cleaners, and miscellaneous laundry aids, such as bleaches, bluing, and starch. Brief discussions are included in dry-cleaning operations, solvents, dry-cleaning soaps, stain removal, finishing, and reclamation of solvent. Sections are also devoted to furniture and automobile polishes, metal polish, floor wax and polish, polishing cloths, dust cloths, sweeping compounds, and wall-paper cleaner.

Value of Marking Hard Spots in Spelling. By L. S. Tireman. Bulletin No. 4, Series No. 179, May, 1930, issued by the University of Iowa, Iowa City. A survey of the literature dealing with remedial work in spelling indicates some uncertainty regarding the teaching of hard or crucial spots. It has appeared necessary in some cases to direct attention to the different parts of works if all the parts look alike, and to show in some manner, the crucial or critical part of each word to be spelled so that it will stand out prominently. The present study which covered 4,000 pupils of grades four, six, and eight, involving a half million spellings, shows that the marking of hard spots is of little or no value. The essential fact in spelling, the study points out, is to write all the letters and have them in the right order. Anything which diverts the pupils from this does harm. It was noted that the pupils who studied words with the hard spots marked made poorer scores than those who studied with words unmarked. In other words, the suggestion of marking the hard spots is a useless procedure, as well as a harmful one.

Educational Tests for Use in Higher Institutions. By J. S. Kinder and C. W. Odell. Bulletin No. 55, August 5, 1930, issued by the University of Illinois, Urbana, Ill. The development of means for measuring school achievement began in the elementary schools, especially in those fields in which the outcomes consist largely of skills and fixed associations. The world war gave a great impetus to the use of intelligence tests with adults, and schools and colleges began to employ them in large numbers. Although 4 per cent of the total school enrollment of the country is in higher institutions, it is doubtful if 1 per cent of the tests employed annually are given in such institutions. In the compilation of the present list, the authors followed the plan of including only tests that are actually available to any person desiring to obtain them, and that also possess sufficient merit to warrant their use. An attempt was made to include those tests that seemed particularly adapted to college or university use, regardless of whether or not they are suitable for use elsewhere. Each test was given an exact title, followed by information as to the various parts or divisions and forms. After this, there was included a short description and criticism, closing with a statement of the time required to make the test. The complete list includes a number of intelligence tests, as well as tests of all the general school and college subjects, together with rating scales and tests for determining teaching ability.

Expressing Educational Measures as Percentile Ranks. By Francis C. Buros and Oscar K. Buros. Price 10 cents. World Book Co., Yonkers, N. Y. Various devices have been employed to interpret test scores, the age and grade being the most widely used. A more useful concept is the percentile method, by means of which a pupil's score is interpreted in terms of the percentage of pupils of the group whom he surpasses in score. The present manual is intended to provide a simple device for expressing test scores of a group as percentile ranks and for interpreting them conveniently. The material offered presents a simplified percentile technique, which is useful by the classroom teacher with little or no training and experience in statistical methods.

FORTY YEARS OF CITY SCHOOL ADMINISTRATION

(Concluded from Page 34)

cation that elected teachers without the superintendent's nominating them would have been much greater.

Today only a few city boards of education appoint teachers without official participation by the superintendent, and these few boards are, for the most part, in towns having a population of less than 2,500. But in cities of this size, according to a study made by the Office of Education, only 3.7 per cent of the school boards appoint teachers without official participation by the superintendent. In all cities of the various population groups reporting, only 1.2 per cent of the boards of education appoint teachers without the superintendent's participation. In 46.6 per cent, the superintendent takes the initial step by nominating candidates; in 24.8 per cent he makes the appointment, which is confirmed or rejected by the board, and in 27.4 per cent there are combinations of methods.

The city school superintendent of 1931 has more power than had the superintendent of 1891, but he is more democratic in his administration. For instance, he no longer compiles courses of study and then commands his teachers to follow them letter by letter. He consults his teachers when changes in the courses of study are thought desirable.

Higher Standards Exacted

The superintendent of 1931 may not be so philosophical as was the superintendent of 1891, but he is more scientific in his attitude toward education. He now makes a study of his problems. In nearly every large city he has organized research bureaus. In the smaller cities, he himself with the assistance of principals and teacher collects, compiles, and analyzes data bearing upon his problems. In the early days the superintendent "thought it out" without many objective data.

No information is at hand showing what proportion of the city school superintendents in 1891 had been graduated from college, but it may be safely asserted that the superintendents who at that time held degrees were few compared with the number today. That most of those who had been graduated from college had no courses in education is evident, since only a few colleges at that time were offering such courses. In 1930, according to a study[2] by J. R. Shannon, only 8.5 per cent of 1,864 city school superintendents upon whose training he compiled data do not hold degrees; 37.1 per cent have bachelor's; 51.3 per cent master's, and 3.2 per cent doctor's degrees.

With the increased educational and professional qualifications required of the modern city school superintendent, partisan politics plays no part in his selection. At one time it did play a part, and a big part. The part it played was commented upon in an editorial which appeared in the AMERICAN SCHOOL BOARD JOURNAL, February, 1892, as follows:

"It is a lamentable fact that in so many of our cities the election of school superintendents rests largely upon political affiliations. In the majority of cases the school board is elected by a popular vote, thus causing a scramble for supremacy of political parties, and to the victor goes the 'organization of the house.' School boards are a miniature house of Congress. The party in the majority will invariably select a president, sometimes a secretary, and too often a superintendent, who conforms to the majority's ideas of a faithful partisan. The representative of the school interests is thus selected partly for his ability and efficiency but mainly for his political faith. An inferior man, versed in political machine work, is apt to triumph over an educator."

Advanced Administrative Policies

In contrast is the following editorial in the August, 1930, number of the AMERICAN SCHOOL BOARD JOURNAL regarding the method now used by city boards of education when they are in need of a superintendent:

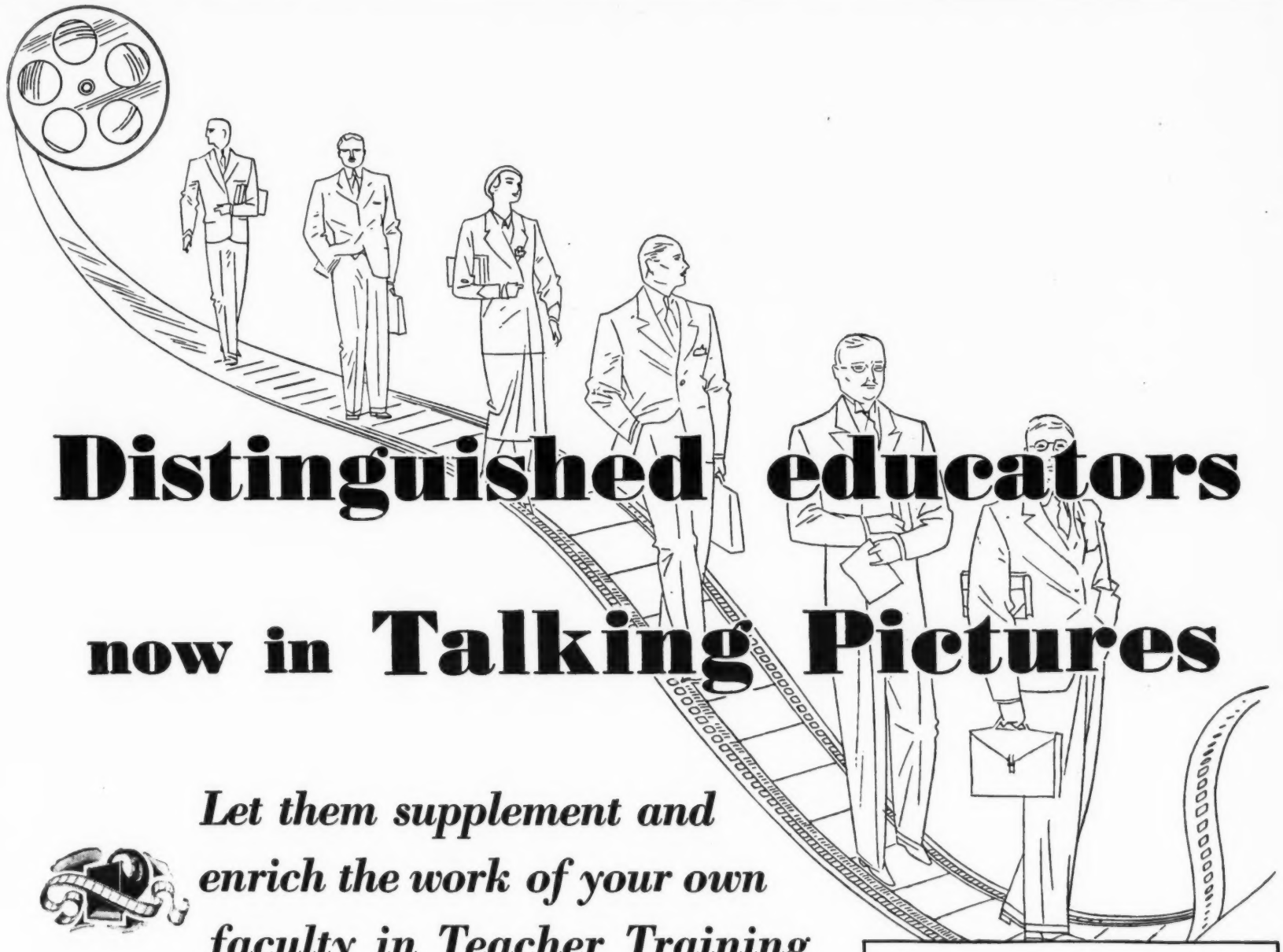
"The tendency on the part of a board of education to cast about over a wide range of territory in the selection of a school superintendent has again been manifested this year. A few years ago we noted the long cross-country calls which came to educators when a vacancy was to be filled, where the board of education set about to find the highest talent obtainable consistent with the financial ability of the community. . . .

"In each instance the school authorities intrusted with the task of selecting a school chief were actuated with the determination to secure the best man obtained in the school-administration field. Local clamor had to be resisted. The man who had an unquestioned record to his credit was sought and found. . . .

"It is needless to say that the procedure adopted by the average American city to secure the best school superintendency service wherever it may be found, attests a higher conception of administrative responsibility on the part of modern boards of education, and tends to place popular educational effort upon a more efficient plane of service."

The city schools of the country, as is evident, are better administered in 1931 than they were in 1891; but many problems still remain for state legislators, city boards of education and superintendents to solve.

[2] "Academic Training of City and Town Superintendents," *School Executives Magazine*, January 1931.



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"Diagnosis of Difficulties in Arithmetic"
Dr. Guy Thomas Buswell
University of Chicago

"Guidance in Public Schools"
Dr. Richard D. Allen
Lecturer Harvard, Brown

"Teaching of Reading"
Dr. Arthur I. Gates
Teachers College, Columbia University

"The Elementary Teacher as a Guide"
Dr. B. H. Bode, Ohio State University

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PUBLIC-SCHOOL BUSINESS ADMINISTRATION IN THE PAST FORTY YEARS

(Concluded from Page 44)

Era of Standardization

Accountancy was uppermost in the minds of the school business executives as 1910 approached. This was evidenced by the formation of the School Accounting Officers Association, in the office of the Commissioner of Education, at Washington, D. C., May 16, 1910. The object of the association, as set forth in its minutes, was "the standardization of fiscal, physical, and educational data of school systems." Two years later the name of the organization was changed to The National Association of School Accounting Officers.

During the next five years the representatives of the school building, engineering, and purchasing divisions dominated the programs of the association. A number of smaller organizations had in the meantime come into existence, their membership being comprised of school business executives interested in building administration, janitorial-engineering service, insurance, and other subdivisions of school business procedure.

Recognizing that the best interests of the public schools was the objective of all of these groups and that all of them were motivated by an intensive urge to raise the standards in every division of school business administration, the National Association of School Accounting Officers, in 1917, affected a consolidation of all these groups into one organization, known as The National Association of School Accounting and Business Officials of Public Schools. This overwhelming name was changed in 1921 to The National Association of Public-School Business Officials.

Between 1915 and 1920 the principle of centralized responsibility reasserted itself. The confused state of affairs that had been brought about by the highly accelerated era of progress that almost swept the school authorities off their feet during the previous fifteen years, began to disappear. The unit and dual types of organization gained many adherents.

As late as 1925, the range of business activities of the public-school system and the responsibility for their administration was still in a rather scrambled state and the administrative machinery crudely organized. The study made by Dr. Heer in 1925 revealed that while the chief executive school officer had become universally known as the superintendent of schools, and the chief executive of a school building as the principal, 23 different titles were used in 97 different cities to designate the chief business executive, and that in every city the duties of this executive were dissimilar. This seems to clearly indicate that the reason for the unanimity on the titles of superintendent of schools and principal is due to the clear-cut duties which these executives perform, and the definite responsibility with which each is vested, whereas the lack of unanimity on the title of business executive is due to the wide range, variety, and variation of duties which he performs and the subdivision of responsibility among coördinate officials, and the absence of a general, universally accepted definition as to just what activities this position embraces. The immediate concern of school authorities is to unscramble this situation.

FORTY YEARS OF PROGRESS IN STATE POLICIES OF FINANCING PUBLIC SCHOOLS

(Concluded from Page 39)

This cry is met on every hand by the carefully worked out and intelligent findings of scientific students who are as one in declaring that school facilities must not be lessened but immeasurably increased, that the increases in school costs have been accompanied all along the line by vast increases in national income, and that the present situation is not one which should arouse fear but rather one which should urge us to the working out and adoption of scientific policies of taxation and of the distribution of school funds and school burdens.

From the utterances of these careful, painstaking, and able experts, America derives hope, courage, and the promise of success in the greatest educational experiment that has ever been undertaken by a free people.

FORTY YEARS OF SCHOOL SEATING

(Continued from Page 60)

of "sealed bids," with the "rejection of any or all bids," the changing of specifications and calling for new bids, and further demonstrations and wastes of time and money, cost American schools hundreds of thousands of dollars annually and in the long run accomplish nothing but getting poorer equipment at higher costs. Usually the total cost to all competitors of trying to get a given job is far greater than the profit accruing to the successful bidder. Not infrequently the selling costs to the seller alone are greater than his profits, and sometimes the total selling costs involved are greater than the gross amount paid for the goods. Only the stupid can fail to see that these inexcusable wastes are all paid for ultimately by the buyer in increased prices or decreased values, and that they can be eliminated only by more intelligent methods of buying.

Some university department of educational administration could not render a greater service than to undertake a research study of the methods of buying school equipment; of the laws, regulations, and practices prevailing; the wastes in prevalent selling methods and their effect upon the progressive development of the

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industry and its products and on the cost of the equipment.

Continued Progress in School Seating

Now, lest we appear pessimistic and too censorious, let us conclude with the assurance that the outlook in this phase of educational progress is most encouraging. At least the beginning of a seating science has been laid in the collating of facts as to practices and opinions and in the accumulation of basic data by methods subjected to critical evaluation. Gratifying response and interest has been shown by leaders both in education and the seating industry. Correct posture is coming to take on a rational and tangible meaning quite independent of sales slogans and pedagogical traditions. It is coming to be recognized that sitting is a dominant physical fact both in school and out, that it is the most universal and persistent occupation of every individual, that it inevitably reacts for good or bad upon mental efficiency, physical energy and vigor, upon the functioning of the lungs, the shape of the spine, the trend of thought, and the outlook on life. It is coming to be felt that this overwhelmingly important art of sitting deserves at least intelligent consideration and recognition in the educational program; that there is nothing that we do more in life and nothing that we do less about or do worse in school than sitting; and that how one sits depends on what he sits on.

Intelligent progress is coming, is just around the corner. The advance guard is with us in the 1931 showing. If the majority of school seats are still of antiquated type, a rapidly increasing proportion — however erratically at times — show interests, thought, and progress. Seating will soon catch up with the educational procession when each of us who knows he has the right idea about it (as most of us have) will admit that there are several other equally right ideas and that progress is in using every good idea to the limit of its value and avoiding the intrusion of it where it does not belong.

Finally, if it is any satisfaction to educators, we may add that however bad seats may be in school, those outside are incomparably worse. Schools have little to learn from and much to teach to the world about the relation of seats to posture, health, or efficiency. From the overstuffed armchair to the Pullman seat, from library chairs to bleachers, nearly everything made to sit on violates nearly every rational principle of sitting. Human anatomy and the law of gravity are defied in the worship of color, style, tradition, and the deceptive lure of softness.

THE DEPARTMENT OF SUPERINTENDENCE—1891–1931

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During the past four decades renewed faith in education has been reflected in larger demands on our public schools. Along with these increased educational demands have come added responsibilities and duties for superintendents of schools. In order that their national organization might be better equipped to meet their needs it was deemed necessary a few years ago to provide an all-year service by the Department of Superintendence. At Atlantic City, N. J., in 1921, a tentative plan of reorganization was adopted based upon the report of a committee appointed a year earlier. The Des Moines convention of the National Educational Association the same year passed legislation to facilitate the proposed plans. A new constitution was submitted and approved by the members of the Department of Superintendence in Chicago, February, 1922. The headquarters of the Department of Superintendence has been located in the building of the National Education Association at 1201 Sixteenth Street Northwest, Washington, D. C., since September 1, 1922, at which time a full-time secretary was employed.

In a peculiar way the superintendent of schools is without the usual opportunities to come in daily contact with other people holding like positions. There is only one superintendent of schools in a city. Have you noticed how often the superintendent of schools wears a Rotary button? There is a reason. He has a classification all his own. Lawyers and physicians, coal merchants and grocers can chat on the links or at a table with others similarly engaged. There is but a single outstanding opportunity for the superintendent of schools to get the help and inspiration which come from contacts with men and women having like duties and problems. That is through the services, publications, and meetings of the Department of Superintendence.

Touching Heart of School Problem

In the scope of its activities there has been marked advance in recent years. The first yearbook, entitled *The Status of the Superintendent,* was published in 1923. Educational history was made by the five curriculum yearbooks, issued annually from 1924 to 1928, under the inspiring leadership of the Commission on the Curriculum. These were followed by two yearbooks dealing with the articulation of the units of American education, which go to the very heart of our school problems. Under the title, *The Superintendent Surveys Supervision,* the 1930 yearbook gave practical help in a field where older methods no longer serve.

In spite of meager funds, the Department of Superintendence has been an increasingly important factor in promoting educational research. In coöperation with the Research Divi-

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sion of the National Education Association, it has an Educational Research Service to which 325 schools and colleges are subscribers. A campaign is now under way to raise a permanent educational research fund of one million dollars, the income of which is to be used for educational research.

The increase in other activities has not lessened the importance of the winter meeting. For over sixty years it has been a great clearing house for American education. One is struck not so much by its growth in size — great as that has been — as by the more scientific quality of its programs and the vast professional improvement in its membership.

The superintendent of schools has a hard job. It is no easy task to face the daily grind of matters demanding immediate action. Plans for new buildings, repairs for old buildings, bond issues, salary schedules, budgets, board meetings, committee conferences, telephone calls, correspondence, visitors, are enough to task severely his time and strength.

Advice and Inspiration

However urgent these things may be, the superintendent who stops after doing them has left undone the more important part of his duty. Schools are organized to serve human needs. In America these needs have expanded tremendously in recent years. The superintendent of schools who allows the pressure of immediate duties to choke out the vision of progress ill serves his community and its children. During convention week, while other cares are put aside, plans for the future have a chance to develop. Selected leaders with something important to contribute appear on the speaking programs. Fellow workers ready with a word of advice or inspiration are in the hotel lobbies.

At the winter meeting, exhibits have a place next in importance to the speaking program. Superintendents of schools must not only know what to do but what to do it with. Schools require a great variety of equipment, textbooks, and supplies. The well-informed school executive must keep up with the progress made on the material side of his profession. School-board members in increasing numbers attend the conventions of the Department of Superintendence to see for themselves what kinds of schoolhouses, what types of seating, what kinds of drinking fountains, what scientific apparatus should be specified for their schools. To quote an unknown authority, "Time, energy, and spirit of pupils and teachers are too precious to be wasted by doing without necessary equipment or by using poor equipment when better is available. That is the lesson that American schools should learn from American industry."

A large sum of money is spent by the people who attend national conventions such as the winter meeting in Detroit this year. If only ten thousand people are in attendance and if each one spends only $50 for railroad and other expenses, the aggregate expenditure is a half million dollars. Probably both the number in attendance and the cost per person will exceed the above estimates. Important results should be achieved to justify this expense. A study of educational progress for the past fifty years clearly shows that the great winter meetings of the Department of Superintendence have contributed in large measure to the progress of public education in America. The cost of attendance at the winter meeting may be considerable, but the cost of absence may be even more. As has been well said, "No superintendent of schools, be he of a large or small community, can come away from this remarkable gathering without taking home new inspiration and strength designed to make him a better administrator and his schools better schools."

THE HILLSDALE HIGH SCHOOL

(Continued from Page 54)

drawers, tacking board and ventilated closet form part of the equipment of every classroom. Each room has brick window sills.

The heating system is designed to maintain all rooms above freezing, when the building is not in use, with banked fires in the boilers. All pipes and radiators are concealed yet accessible. No pipes of any description are built into the walls, or under the floors, or otherwise placed in inaccessible locations.

The building is decorated throughout with appropriate and attractive color schemes.

Shortly after construction was started Superintendent Erickson was called to a new position, and his place was filled by Supt. L. P. Holliday, who studied carefully what had gone before and took an active part in selecting the furniture of the building. His work in securing beautiful and appropriate furniture for the building at a moderate cost is an outstanding example of what can be accomplished in this field.

This building is of fireproof construction with face brick on all elevations, limestone trim on the exterior, and oak trim and doors on the interior. It is connected to an old building containing 12 small classrooms which is heated from the new building. The new building cost $260,600, or 23.4 cents per cubic foot. The furniture and draperies cost $16,000. Together with the old building it provides for 800 students in the upper 6 grades. The construction is one on the unit plan with units of 12 ft., using the self-contained H-columns for interior supports, ventilating flues, and pipe shafts. Each building unit is in turn self-contained and complete in regard to heating and ventilating, with all interior finish built to standard dimensions, making the building 100 per cent flexible.

Much of the merit of this building lies in its

being economically built and furnished. It recognizes the need for economical construction, but it also recognizes as of equal importance the need for a stimulus and outlet for the emotional phases of both child and adult education. It provides for a new school procedure where freedom, activity, interest, and participation are given equal standing with bookwork, study, and recitations. It recognizes the school as a community more or less self-contained and provides for a new school society where the school creates and solves many of its own problems. It represents value for the money spent in just so far as it succeeds in realizing these ideals.

AUDITORIUM, HILLSDALE HIGH SCHOOL, HILLSDALE, MICHIGAN
The Warren S. Holmes Company, Architects, Lansing, Michigan

SCHOOL CAFETERIAS GROWING

The hot lunch is gaining consideration in the schools of this country, says a recent report by Emeline S. Whitcomb, of the Office of Education, Washington, D. C. School cafeterias are being installed in this country at the rate of almost 7,500 annually and already number about 64,500. Besides these about 11,400 schools are serving lunches and hot dishes, bringing up the total number of students served daily to 8,000,000. This represents about a third of the country's school children. The cost of the food served is estimated at more than $243,000,000 a year. The need for school feeding was first felt when it was found that many children were receiving little benefit from the education offered because they were not properly nourished. From the standpoint of economics, vast sums of money were being wasted through the inability of children to assimilate knowledge on an empty or uncomfortable stomach.

ADMINISTRATION NEWS

♦ All the schools in Rich county, Utah, have been equipped for radio broadcasting. The school board provided part of the funds for installation, while the remainder was supplied by the various schools through special activities and donations.

♦ At the suggestion of Supt R. D. Law, a survey of the schools of Rich county, Utah, has been made by experts of the state education department. The survey committee gave tests, observed instruction, examined forms and records, and scored the school buildings. Mr. Lofter Bjarnason, state supervisor of grade and junior high schools, acted as chairman of the group.

♦ The present state schoolbook commission in Kansas will be eliminated and a new one created, under a bill recently introduced in the state legislature. The present commission is composed of the heads of three state educational institutions. The new commission would be composed of the state superintendent of schools, and four members to be appointed by the governor. Under the new plan, there would be fewer changes in textbooks. The commissioners would serve for four years each.

THE NATHANIEL HAWTHORNE SCHOOL, UNIVERSITY CITY, MISSOURI

(Concluded from Page 51)

As illustrated in the plans, the complete building provides 20 classrooms, a kindergarten, domestic-art room, a boys' shop, four large rooms for special activities, a cafeteria, a combined auditorium-gymnasium, and two play- or early-morning rooms.

The first unit of the building was erected at a cost of $155,415. Mr. Charles Banks is superintendent of schools.

THE NEW SENIOR HIGH SCHOOL, FAIRMONT, WEST VIRGINIA

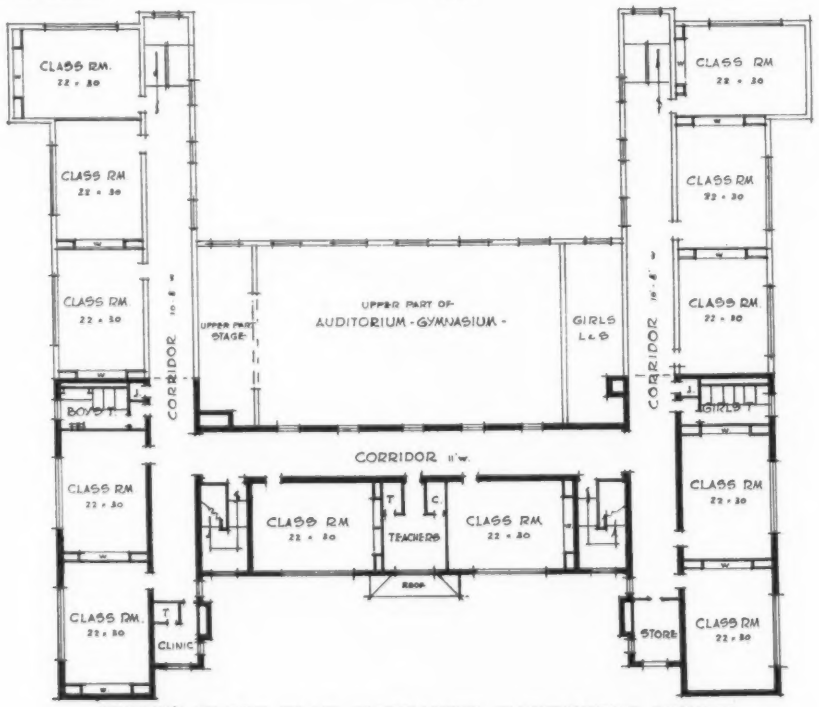
Wm. B. Ittner, F.A.I.A., Architect, St. Louis, Mo.

The new senior high school at Fairmont, was planned for 1,036 pupils with possibilities of expansion to 1,500. It contains 33 classrooms, an auditorium seating 1,107, a double gymnasium, a cafeteria, and a library. Colonial in design, appropriate to Fairmont traditions, it is three stories in height, of brick construction with slate roof.

The plan is arranged around a central open court with auditorium and gymnasium on opposite ends, both having direct outside entrances. Shops, home economics, and the cafeteria occupy the ground floor, with class, special rooms, and library on the two upper floors, across the front and rear. On entering the main floor of the building, one looks across the central open court to the projecting conservatory of the science room along the rear side of the court.

The expansion of the building is arranged for by the future addition of two wing buildings.

The building was erected at a cost of $400,626, or $386.70 per pupil.



SECOND FLOOR PLAN, NATHANIEL HAWTHORNE SCHOOL, UNIVERSITY CITY, MISSOURI
Wm. B. Ittner, Architect, St. Louis, Missouri

♦ Samuel E. Knause, superintendent of school buildings at Fremont, Ohio, died on January 31, after a month's illness with hardening of the arteries. Mr. Knause had worked in the school system since 1900, first as a carpenter, then as janitor, and finally as superintendent of buildings.

♦ The school board of Marion, Ohio, has sold $450,000 worth of school bonds, the second group of a $750,000 bond issue voted two years ago. Money provided by the bond issue will be used for new school construction.

♦ The Fruth Elementary School, at Charleston, W. Va., was opened for the first time in February. The building contains 25 classrooms, in addition to an auditorium-gymnasium, playrooms, restrooms, and a principal's office. The building is completely equipped.

♦ The school board of Vancouver, Wash., has been offered free of all encumbrance, the $100,000 community building owned by the city, for use as an administrative building. The building was built by the American Legion, and was owned and used by the city, until vacated for new quarters in the new municipal building. The school board has intimated that it will accept the building.

School Finance and Taxation

NEW YORK STATE SCHOOL STATISTICS

Outstanding facts in education have been brought out by the New York State Department of Education, as follows: Seventy-two per cent of the cost of maintaining all of the schools in the state is for teachers' salaries. The increase in teachers' salaries is 66 per cent of the total increase in total expenses. The cost of education per pupil is increasing. For the year the increase was $9.30 per pupil. There were 142,435 girls and boys who completed the eighth grade and 41,198 who were graduated from high school. The cost of maintaining the public schools of the state during the year was $244,684,859.62, while $376,071,512.37 was charged to debt service and capital outlay, an increase over the previous year of 15.9 per cent.

FINANCE AND TAXATION

♦ The four main points to be considered in preparing a school budget, as explained by Prof. H. T. Scoville, of the University of Illinois, are: (*a*) Whether each function or activity receiving support should continue to receive it. (*b*) What, if any, new activity should receive support? (*c*) The relative public importance of each function under consideration to the general administrative scheme. (*d*) What amount of financial support is necessary to maintain this relative importance from the point of view of the public and its interests?

♦ By a vote of 902 for and 8 against, the Renton, Wash., school district voted a bond issue of $200,000 for a new high school.

♦ The educational department of the State of Washington has proposed a measure to the legislature whereby the state and county support for schools is increased.

♦ Barberton, Ohio. The board of education's budget for the year 1931 totals $484,065, with $323,618 appropriated for operating expenses. The largest item in the budget is $175,000 for teachers' salaries.

♦ Steubenville, Ohio. The school board has appropriated $670,062 for the operation of the city schools in 1931. The largest item is $480,500 for school instruction. For the operation of the school plant, $46,500 is set aside; for janitors' salaries, $45,000; for supplies, $23,200; and for repair of buildings, $25,000. The teachers' retirement appropriation is $17,000, while the amount for insurance is set at $5,000.

♦ Chillicothe, Ohio. The school board has appropriated $334,535 for the operation of the school system in 1931–32. The largest item in the budget was $169,900 for expenses of instruction. The total for debt service is $92,465, and capital outlay is given an appropriation of $8,250.

♦ Pittsfield, Mass. The school board has adopted a budget, calling for an appropriation of $847,100 for the year 1931. The largest item in the budget is $630,000 for teachers' salaries. The second largest item is $45,000 for a new high-school building.

♦ The school board of Malden, Mass., has adopted a budget of $765,000, which represents an increase of $21,572 over that of last year.

♦ Pawtucket, R. I. The school board has asked the city council to appropriate $995,335 for the operation of the school system in 1931. The budget represents an increase of $11,000 over that of 1930.

♦ Dayton, Ohio. The 1931 budget of the school board calls for an appropriation of $4,384,513, which represents an increase of $405,858 over the amount spent last year. The increase has been attributed to the increased expense and certifications brought about as a result of the annexation of territory. A total of $1,085,000 was appropriated for the administration department, and $2,690,940 for the superintendent's department, which includes teachers' salaries and the purchase of supplies.

♦ East Waterloo, Iowa. The school district recently voted to retire $90,000 of a $100,000 bond issue floated in September, 1928. A new issue of $90,000, with interest at 4½ per cent has been substituted. The proposal means a saving of $225 to the taxpayers the first year, with slightly smaller savings for each succeeding year as the issue is retired.

♦ Springfield, Mass. The school board has adopted a budget of $2,920,754 for the school year 1931. This is an increase of $100,000, or 3½ per cent over last year. The increase takes care of the salary increases due to the new salary schedule, and the salaries of additional teachers needed in new schools and in new classes in congested sections.

♦ Caldwell, N. J. The school board has adopted a budget of $236,850 for the year 1931.

♦ Middleton, Ohio. The school board has adopted a budget of $491,846 for 1931, which is a reduction of $24,415 from that of last year. The largest item in the budget is $332,200 for instruction purposes.

♦ The school board of Ironton, Ohio, has adopted a budget of $305,252 for the school year 1931. The largest item is $145,056 for teachers' salaries.

♦ Saginaw, Mich. As a thrift measure, the school board has purchased $50,000 of its own bonds as an addition to the sinking fund now being built up to cover the retirement of a $500,000 bond issue for a school building. The bonds bear 5½ per cent interest and were bought at a price that would give a yield of 4.1 per cent, or 1.1 per cent more than the interest rate which would be paid by the board's official depository, if the money were allowed to remain as cash in the sinking fund.

♦ New Britain, Conn. The school board has adopted a budget of $1,332,893 for the school year 1931–32. The sum of $1,113,556, or 83½ per cent of the whole budget, is for salaries of teachers, janitors, and services. The amount for day schools alone was $909,109, which is an increase of $28,222 over the past year.

♦ Erie, Pa. The school board has sold $500,000 worth of 4½-per-cent school-improvement bonds. The bonds were part of a $2,500,000 issue voted several years ago.

♦ Lima, Ohio. The school board has adopted a budget of $820,058 for the school year 1931, which is a decrease of $128 from that of 1930. The budget includes an appropriation of $549,361 for personal service.

(Concluded on Page 130)

(Concluded from Page 128)

♦ Bridgeton, N. J. The total amount to be raised by taxation for schools this year has been set by the school board at $185,556, as compared with $185,240 last year.

♦ Homer P. Shepherd, who retires from the superintendency of the Knoxville, Tenn., schools, received a salary of $7,500. It is proposed to offer a smaller salary to the new superintendent which prompts the *Knoxville News-Sentinel* to say: "A big salary should not be paid unless a man worthy of such a salary is hired. The big salary alone will not dignify the job unless the man merits it. But it will be money well spent to pay whatever it is necessary to buy the high ability the job requires. If the school board can get a high-grade man at a bargain, all praise will be due the board. But a cheap man will be expensive at any price."

♦ Toledo, Ohio. The school board has adopted a budget of $4,819,086 for the year 1931, which is a reduction of between $350,000 and $400,000 from that of the original estimate. A drop in the tax duplicate from $619,552,180 in 1930, to $593,400,040 in 1931, was responsible for the reduction which has curtailed the upkeep for school buildings. There has also been a reduction in the tax rate from 7.37 mills to 7.32 mills.

♦ The board of education of Ansonia, Conn., has accepted an appropriation of $160,000, representing a reduction of $2,545 at the hands of the board of apportionment and taxation. The board has revised its budget for the ensuing year to meet the appropriation. The reduction was made to limit the taxes to a certain definite figure.

♦ The state board of control of Ohio has set aside $800,000 from the $2,000,000 state-aid fund for use for the payment of teachers' salaries in weak school districts. In most state-aid districts teachers' salaries have been delinquent since January 1, because of a lack of funds. The money is to be used for salaries only.

♦ East Cleveland, Ohio. A saving of approximately $60 a day has been effected by reducing the number of substitute teachers. Instead of calling a substitute when a regular teacher is absent, an assistant principal, or a supervisor handles the teacher's work. The action was necessary because of a reduction of $81,000 in the school budget.

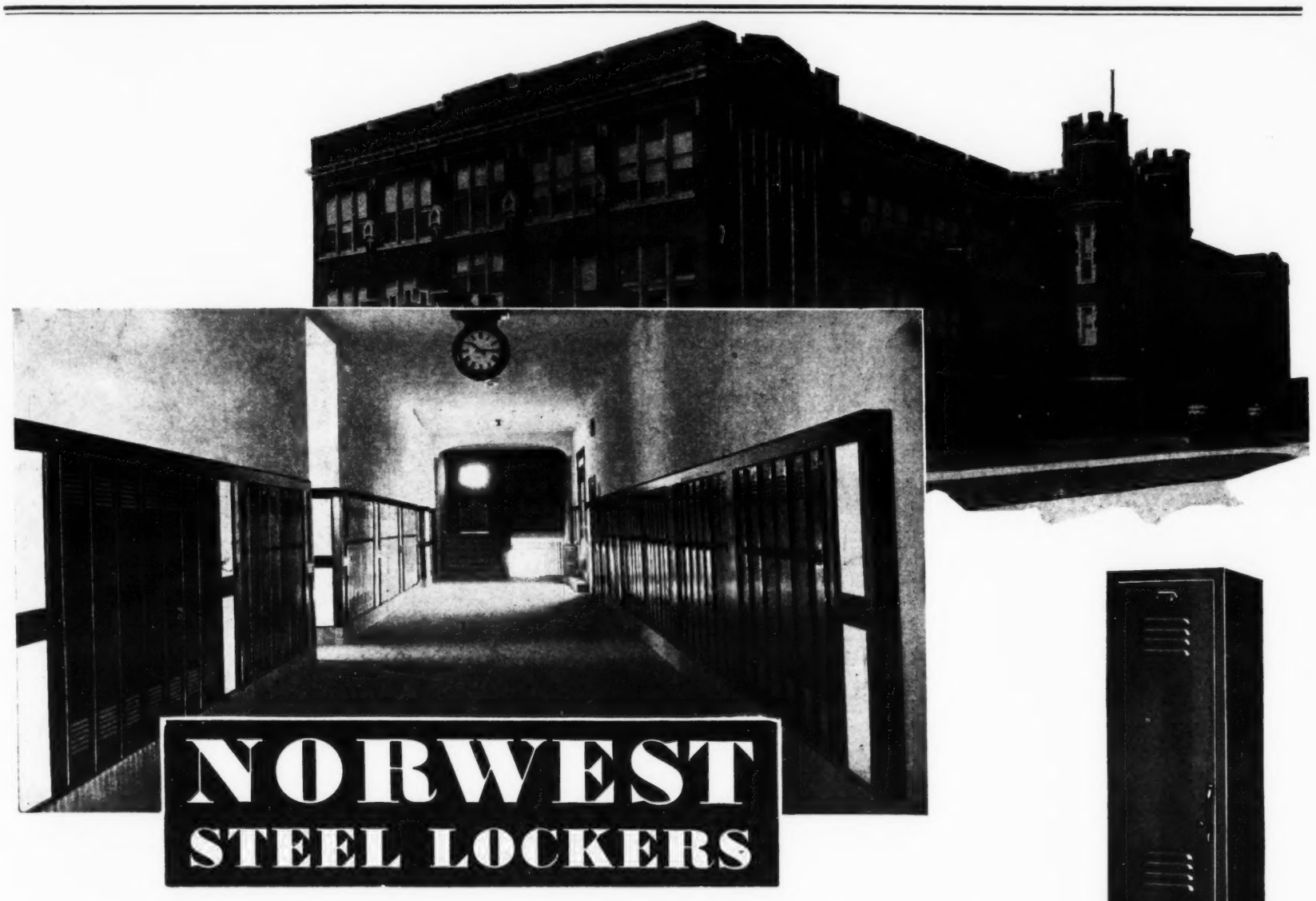
♦ Willoughby, Ohio. The school board has adopted a budget of $188,540 for the school year 1931–32. The largest item in the budget is $61,400 for bond retirement. The second largest item is $51,750 for teachers' salaries.

SCHOOL ELECTIONS

The officers of the Illinois State School Board Association for the present year are: president, Frank J. Petru, Cicero; vice-president, L. L. Tuley, Wood River; treasurer, F. E. Williamson, Urbana.

PUBLIC SCHOOL 106, EDGEMER, NEW YORK CITY

In the rapidly-growing sections of New York, elementary buildings are being put up piecemeal. The building illustrated is the first section of what will ultimately be a school to house 1,500 children. The present building cost $323,000 and has a seating capacity of 482. It was planned and built under the supervision of the Bureau of Construction and Maintenance. Mr. W. C. Martin is the Architect and Superintendent of Buildings.



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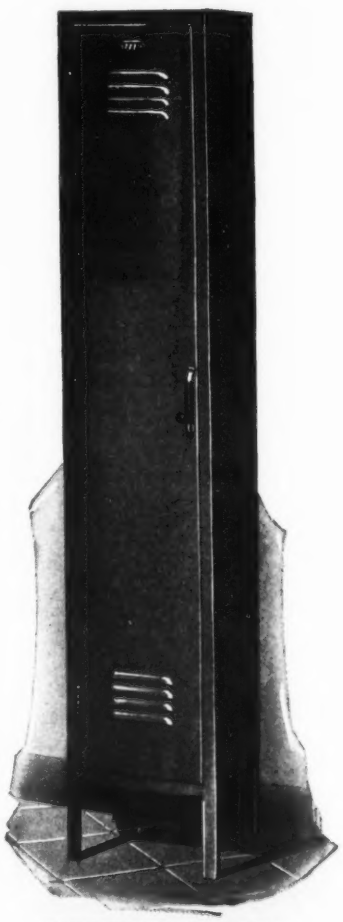
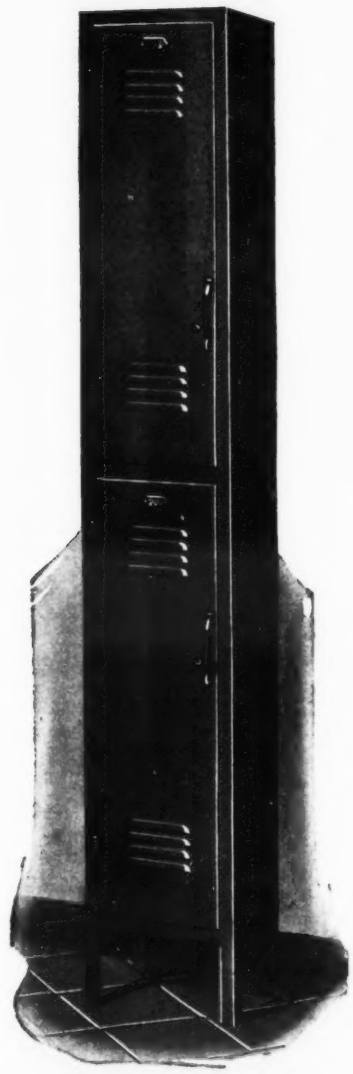


NORWEST Single-Tier Locker



NORWEST Double-Tier Locker

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School Building News

AUDITORIUM-GYMNASIUM FACILITIES FOR SCHOOLS

The Ohio High School Standards provide that every first-grade high school must have a gymnasium of standard size, and that every first-grade high school must have an auditorium. In the case of the latter, schools which show reason, satisfactory to the state department for inability to comply with the requirement may have exemption until 1935.

A study recently undertaken by Mr. A. W. Shields and Mr. T. C. Holy of the facilities in county high schools sought to determine the extent to which boards of education of Ohio are providing auditorium-gymnasium facilities for high schools under county supervision, but also to class these facilities by a variety of significant features. Facts of location, type of school organization, and enrollment, use of both for school and nonschool activities, and general administrative policies with respect to them were gathered.

The study covered 651 high schools having enrollments of 50 or more pupils, which were under county supervision during the school year 1929–29. Replies were received from 513 schools, or 79 per cent. The first type, including combination auditorium-gymnasium with the seats on the floor level, is the predominate type with 148 schools, or 29 per cent of the total. It should be noted that 44, or 8 per cent of the entire group, have neither auditorium nor gymnasium facilities, and are therefore not complying with the requirements of the high-school standards.

Schools having enrollments of less than 400 usually have a combination auditorium-gymnasium. The median hours of use per week in the 469 schools having such facilities for school activities only, was 22.2, while that for outside organizations was 1.7 hours per week. Four hundred four, or 88 per cent of all the schools having these facilities, report some community use. Most of the schools make a nominal charge ranging from $5 to $10. The janitor is paid an extra fee for opening the building for outside activities in 53 per cent of the schools, the other 47 per cent making no provision. The rate for this service was usually from $1 to $2 for each occasion.

The study revealed that a large proportion of the high schools under county supervision comply with the requirements of the high-school standards in the matter of auditorium-gymnasium facilities. It also indicated a wide difference in policies of various boards of education with respect to the amount and character of the use of such facilities.

BALTIMORE TO PROVIDE ADEQUATE HOUSING

More than 100 portable school buildings are in use in Baltimore, Md., according to the *Baltimore Sun*, and 2,913 pupils in the schools are on part time, according to the latest statistics of the school board. The greatest increase is in those districts where home development has been most rapid, and school authorities have reported that the city and school population have grown too rapidly for them to keep up with it.

Part-time schedules were abolished for a few months in 1927. Since then the increase in school population and the removal of students from older parts of the city to new sections have been such that emergency measures have been deemed necessary.

The Public Improvement Commission is promoting a school-building program to assist the school board in its efforts to provide adequate housing. Mr. H. Webster Smith, chairman of the commission, has set a goal of three new schools each month. It is the opinion of the school authorities that dependence may have to be put on a new school loan to meet the situation.

SCHOOL-BUILDING NEWS

♦ North Platte, Nebr. The school board completed during the year 1930 an extensive school-building program. The program which included a senior high school, two elementary schools, and the finishing of parts of two other schools, was completed at a cost of $492,500. The building program was financed by a bond issue which was approved by the voters in the year 1929. W. J. Braham, superintendent of schools.

♦ Minneapolis, Minn. At a meeting of the city board of estimates, the school board presented proposed school-building projects to involve an expenditure of $711,833 for two junior high schools, and $500,000 for an elementary and junior high school. An appropriation of $400,000 was asked for the first section of the new vocational school.

♦ A new school building, to be erected in Pittsburgh, Pa., at a cost of $600,000, will be named after the late Dr. William M. Davidson, superintendent of schools.

♦ New York, N. Y. A school-building program looking toward an expenditure of more than $55,000,000 and calling for the construction of 85 new buildings has been presented to the board of education for approval. The program, not all of which will be carried out during the present year, is said to be the largest school-building program in the history of the schools. It will provide 100,000 additional seats and will practically eliminate short-time in the elementary schools.

The program includes the construction of 65 elementary schools, 15 high, and 4 special schools. A part of the money will be applied to the construction of additions for 127 elementary schools and 20 high schools.

The Milwaukee board of education recently adopted a resolution which says that that body "disapproves the purchase of real estate for speculative purposes by any members of the board or its administrative employees whose particular position may be directly or indirectly connected with recommendation of school sites, or whose advance knowledge of the school-building program may place such employee in a position to create personal profits."

♦ Providence, R. I. The school board has committed itself to a policy of regional senior high schools, following a two-year study of the problem. The board has adopted a program providing for three new schools, one to be built in the northwest section of the city, a second on a site near the present Hope High School, and a third in South Providence.

♦ Rock Springs, Wyo. The voters have approved a school-bond issue of $350,000 for the erection and equipment of a senior high school. The board has obtained a large site as the location of the new building, which will accommodate an enrollment of 600 to 700 students.

♦ Mr. L. E. Myers, president of the Chicago board of education, recently presented a proposal to the school board, calling for the elimination of the department of architecture, and of establishment in its place, of a corporation controlled by the city. The plan presented by Mr. Myers, calls for the creation of a board of trustees, composed of a banker, a representative of union labor, an engineer, and a business man, whose salaries would be $10,000 a year each. The mayor would have the final word on appointments and his selections would be from a list of fifteen names representing well-known business and trade organizations.

The corporation would act independently of the board of education in the letting of contracts and the approval of finished work. It would undertake construction and repairs upon assignment from the board, which would, in turn, reimburse the corporation by monthly payments.

♦ The city of Ketchigan, Alaska, has found it necessary to enlarge its schoolhousing facilities. Figures compiled by Supt. A. E. Karnes show that the enrollment in the graded schools has increased 99 per cent, and in the high schools 254 per cent in the past ten years. The general increase has been estimated at 123 per cent during that time.

♦ "The financial program of St. Louis, with reference to the erection of new buildings, is unique among the large cities of the country," said Mr. Arthur A. Blumeyer, of the St. Louis board of education, recently. "Only once under the present charter have the voters of St. Louis been asked to authorize a bonded indebtedness for school buildings. This was in 1916, when a three-million-dollar bond issue was voted. By careful economy this indebtedness has been reduced, so that in all other cases the erection of new buildings has been upon a cash basis."

♦ Rockford, Ill. The school board has adopted a budget for the year 1931, calling for an appropriation of $1,731.124, or $89,696 less than the amount asked in 1930. The budget includes an educational fund appropriation totaling $1,415,287, which is an increase of $24,839 over the 1930 budget. Building-fund appropriations totaled $135,837, or $114,536 less than was set in 1930.

UNION SCHOOL, PORT DICKINSON, NEW YORK
R. W. Jewell, Architect, Binghamton, New York

The Union School, illustrated above, has been more than doubled in capacity by the addition shown in the picture. The original building contained eight classrooms of conventional type. The new addition contains ten classrooms, a library, administration offices, shops and workrooms, and an auditorium-gymnasium. It enables the school authorities to work out a complete junior-high-school program. The building is heated with a vapor steam heating system and is equipped with unit ventilators. The cost of the addition was $125,000. The school is headed by Mr. Glenn A. Slater, Principal.

Radio Education

(Continued from Page 63)

discussions that the greatest benefits will arise. The methods adopted in any city have not been hewn out definitely, and we must depend upon further development coming from the teachers. These meetings will have covered say one month, and most of the teachers will have had an opportunity to hear and use a radio lesson two or three times.

It should be worth while at this point to arrange for a demonstration of the use of the radio lesson. A teacher who has had the best success with the radio lesson, or one whose subjects lend themselves to wider varieties of teaching technique, such as science, or music — or even the administrator himself may take charge. A group of pupils of average ability should be selected and a time should be set so that all teachers may attend. The teachers should plan to utilize as many methods as possible, and the demonstration should include the three major steps, preparation, use, and review. Closely following the demonstration there should be an opportunity for critical analysis, in a group discussion, of the technique displayed in the demonstration.

One of the determining factors in the type of preparation to be made by teachers, at least in this stage of radio lessons, is the type of advance lesson material available to the teachers. Until teachers have had enough experience to have developed habits in this lesson, as in others, their technique will necessarily be faulty, halting, and often ineffective. A good lesson sheet, with as nearly complete directions for preparation, use, and review as possible, will be a material factor in improved instruction by radio.

In this phase of preparation we have much room for development. England has a complete and effective system worked out through lesson leaflets, to which is added a weekly publication, *The Listener*. The lesson leaflets, in themselves, include oftentimes 25 to 30 pages of descriptive material. Pictures, diagrams, and sketches are used. All the material to be presented is given, together with questions to be used before and after the broadcast, as well as devices and materials from which the teacher may select. *The Listener* informs of the scheduled broadcasts, gives résumés of those which are past, criticisms of the "topical talks," and other information of interest to listeners.

The Ohio School of the Air Courier has been a splendid attempt to do much the same thing. A summary of the lessons to be broadcast, together with devices to be used, pictures, etc., has been indexed by subjects and sent to the coöperating schools at the first of each month. The material is in loose-leaf form, punched and ready for placing in a binder.

The time of distribution of preliminary material seems to play an important part in the number of teachers who will listen, as well as the type of listening done by those coöperating. It is difficult, in the type of broadcasting done, particularly by the Ohio School of the Air, to arrange a schedule for the entire year, with times, subject matter, and radio teachers all completely scheduled. This has been much easier in the type of work done in the English schools. There, no effort is being made to give specialized subject instruction and by this reason alone it has been easier to schedule broadcasts a year ahead. However, to become of maximum efficiency the program must be outlined for the school year so that local schools may do all their planning at the beginning of the year. This means that the lesson material should be in the hands of the administrator a week or two, at least, before school begins and in the teachers' hands the first week of school.

If this lesson material is outlined for the year, as suggested, it will be easy to include the lessons under one cover, to avoid the danger of loss, and to make all of them readily accessible. To assure all of the ideas, as to preparation, subject matter to be covered, and types of review to be used, being readily seen and used, a column type of physical form is best for this booklet. One series of radio lessons should constitute one compact teaching unit with specific aims. Each separate broadcast lesson must be, then, an integral part of the whole and each must have a relation to the one preceding as well as the one following. This column arrangement and the teaching unit are easily worked out for the average textbook material. In making the same arrangement for material, all of which, it must be remembered, should be supplementary, the task will be more difficult. The result in continuity of thought and clearness of plan will be worth the effort.

It is certain that every teacher should be supplied with this preliminary lesson material and it is desirable that the pupil have definite material on the broadcast, too. If the teacher is supplied with booklets including the subject matter to be covered, preparation and review, then added sheets might be sent for the pupils' use. These sheets may include pictures, diagrams, a brief outline of material to be covered, with references and detailed directions for preparation and even tests for distribution after the broadcast. If these are not furnished, then the teacher should plan for using the blackboard or a hektograph in the preparation of something similar.

After use, this material should be preserved and filed for future use.

(To Be Continued)

S. M. STOUFFER
Superintendent of Schools,
Wilmington, Delaware

Mr. Stouffer, on January 26, was reëlected head of the school system for a term of three years. This is the first time in the history of the Wilmington schools that a superintendent has been elected for more than two years.

Mr. Stouffer is a graduate of the Shippensburg Teachers' College, Susquehanna University, and holds the Master of Arts degree given by New York University. He was superintendent of schools at Hanover and Pottstown, Pa., before going to Wilmington.

THE VALUE OF STANDARDS FOR HIGH-SCHOOL LIBRARIES

Dan H. Perdue, State Supervisor of High Schools, Charleston, West Virginia

The high-school library is an agency of unification. Where properly equipped and administered, it becomes the center for the socialized activities of the school. It eradicates the socially undesirable points of contact of the pupils and replaces them with those that are wholesome. In the library, reading tastes are developed and reading for pleasure and profit is done. There is no better place than the library for pupils to be instructed in the proper use of books, since it is the only source of instruction for a large number of students.

Within recent years, school administrators have come to recognize the library as the heart of the school. Many of the demands for adequate equipment of the high-school library have been met and the library of the present day does not need any argument to prove its merit.

The curriculum of a school should determine the nature and size of the book collection in the library. The course of study for the state schools prescribes a curriculum and some definite standards have been set up for the library. Before being classified by the state education department, a school must have a well-rounded library, consisting of a definite number of books per pupil according to enrollment. Library books must be cataloged by author and title.

The following is a guide to the number of books required:

Enrollment	*Number of Books*
Up to 249	8 books per pupil
250–499	6 books per pupil
500–999	5 books per pupil
1,000 and up.....	4 books per pupil

The books for the library should be selected from a list prepared by the state education department. Gifts should be carefully scrutinized before they are accepted as part of the required collection. Each accredited school must provide a yearly budget of $1 a year per pupil for books, $50 for periodicals, and $75 for supplies.

The state committee of the Northcentral Association of Colleges and Secondary Schools has ruled that high schools desiring to acquire membership in the association must meet the following standard for number of books in the library:

Enrollment	*Number of Books*
Under 250	10
250–499	7
500–999	5
1,000–1,999	4
2,000 and up.....	3.5

The library itself should be carefully planned. The principal or superintendent should not attempt to plan a new library, or remodel an old library, without first obtaining the assistance of a trained librarian.

The location of the library is important. Its purpose is to serve the pupil and it should be located at the place most accessible to the students and the departments which use it. It should be located on the second floor, with an exposure admitting plenty of light. Artificial lighting should be of the indirect type of ceiling fixture. The library should be separate from the study hall and should not be used for recitation purposes. The floor should be covered with battleship linoleum, or some other material to deaden the sound.

In the equipment of the library, the best practice calls for shelves built in all available wall space from a point of 7 ft. downward. In a properly planned library the shelves are of different width so as to furnish the proper space for books and bound volumes of different sizes. In addition, there should be a rack for magazines. The library table should be 3 ft. by 5 ft. in size and should be so arranged that the fewest possible readers will face the light. The seating capacity of the room varies from that of the average classroom in the small high school to 5 or 10 per cent of the daily attendance in the large high school. A well-equipped librarian's workroom 10 by 15 ft. in size, and well lighted, adjoins the reading room.

The provision of a well-located and properly equipped library is of secondary importance to the selection of the librarian. The service which the library renders is an accurate measure of the ability and training of those who administer it. The librarian who encourages children to read good biography helps them to follow out their ideals and aspirations; by careful selection of books, the librarian brings the pupils in contact with imaginative literature, and creates an atmosphere which breathes the spirit of culture and the fine arts.

The emphasis placed on the high-school library during the past few years has made possible much progress in this direction. Since 1926 there has been an increase of 20 full-time librarians in senior high schools of the state, and an increase of 16 full-time librarians in junior high schools. During the same period, the number of part-time librarians has increased from 88 to 169 in senior high schools, and to 31 part-time librarians in junior high schools. While the growth in the number of full-time librarians will be slow, it is evident that there is need for at least 1 part-time trained librarian for every high school in the state if the best interests of the students are to be properly served.

School Board News

♦ In Millard county, Utah, the term of office of members of the board of education is four years. At a recent school election, two members were reëlected, one for a second term, and one for a third term, and one new member was elected to membership. Two members were holdovers, serving their second term, or seventh consecutive year. Such continuity of school-board service makes for longer tenure of school officials, and insures more stability and progress in the school system.

♦ Atlanta, Ga. The mayor has appointed a special commission of seven members, which is to offer suggestions looking toward changes in the school system and to present recommendations based on a thorough study. The commission consists of eight members, four private citizens, two members of the board of education, and two members of the city council. Tentative plans call for a combined school system embracing the borough of Atlanta and other boroughs making up the city, under the direction of a board of trustees. The latter would be given power to raise and expend revenues for the schools.

♦ Moline, Ill. Principal C. R. Crakes, of the Deere High School, has adopted some new regulations for the government of the school. Under the rules, new and old textbooks will be sold in the school building by the board of education. New books will be loaned out on a rental basis, at a rate of 25 cents a book. Secondhand books will be sold at reduced prices.

♦ Lorain, Ohio. The school board recently lost a two-year fight to escape the payment of taxes on improvement of streets adjoining school property. A ruling of the attorney general of the state is to the effect that a board of education is liable for the payment of special assessments when such assessments are made against the board for improvements to pavements and sewers. Until two years ago, such taxes were paid by the city. Then the city began billing the school board which paid the taxes, but only under protest. Last year the school board paid out $1,564 for taxes, and has set aside $2,050 for this year's taxes.

♦ Monroe, Mich. The school board has discussed a proposition for reducing the salaries of the teaching staff. The matter must be determined promptly since contracts with the teachers are signed in March of each year. The teaching staff has 97 members.

♦ New York, N. Y. Mr. Howard W. Nudd, director of the Public Education Association, in a recent statement, has urged a change in the procedure of selecting persons for responsible positions in the city school system, with merit as the basic qualification. The failure of the board of education to fill an existing vacancy in the board of superintendents inspired a severe attack on the board for permitting politics to play a rôle in naming the new member.

♦ Detroit, Mich. In a communication to the mayor, Mr. E. H. Williams, a member of the school board, has recommended the elimination of supernumeraries from the payroll of the board, and the placing of higher educational institutions on a self-supporting basis. Mr. Williams urged the mayor to make reductions in the board's budget totaling $1,013,505. If the recommendations are adopted, more than a score of positions will be eliminated, as well as the psychological clinic, the research and placement departments, and the children's museum.

♦ The school board of Holyoke, Mass., by a vote of 6 to 3, recently rejected a resolution to eliminate standing committees and to have the business of the board handled by a committee of the whole. The board was asked to approve a plan of Supt. W. R. Peck, providing for the purchase of school supplies by bid, at the beginning of each school year. The new plan would effect a substantial saving in the purchase of materials for the schools.

♦ Columbus, Ohio. The local board of education was upheld in a suit of the Indemnity Insurance Company brought against the board. The insurance company claimed that the withholding of $925 from R. W. Loomis, contractor for a school building, was a penalty rather than liquidated damages as claimed by the school board. The court, in its decision, pointed out that the specifications stated the penalty for noncompliance with the contract, and that any bidder is presumed to understand and agree to the amount of damages. The school board was put to an inconvenience by the failure to have the building completed by the beginning of the fall term in 1928.

♦ Bristol, Conn. The school board recently voted to eliminate automatic salary increases, and to grant no additional increases during the school year, because of general business conditions. Previously, it had been the policy to raise salaries $100 annually and to allow another $50 where the teacher had taken a special professional course during the preceding year.

♦ The school board of Bucyrus has discontinued the high-school cafeteria because it has been operated at a loss. It seems that the students brought their own lunches to school and ate in the cafeteria. Only 15 students patronized the lunchroom, while 50 others brought their own lunches.

♦ Mr. Edward Merchant, secretary and business manager of the board of education of Philadelphia, Pa., recently issued his annual report for the year ending December, 1930, in which he called attention to some of the things accomplished during the past year.

First, he called attention to the fact that in the troublous time of municipal financing through which the city has passed in the past three years, the school district has come through without serious difficulty. The troubles of the school district were minimized by the strength of character exhibited in the form of action taken whereby the troubles were averted. The school board preferred, in the interest of all, to proceed through an

(Concluded on Page 140)

(Concluded from Page 138)

increase of the tax levy to meet the emergency then presenting, which tax levy for the subsequent year has since been reduced.

During the year, the school board carried on its modified building program. The vast improvement in the structural situation, the shift in population, and the effects of the depression, were ample notice that much more time and study were required for future placements than was previously required.

The board carried on an intensive program of building repairs. In the interest of nonemployment, 50 mechanics and laborers were employed temporarily during a period of two months.

The board is erecting an administration building without calling upon any part of annual taxation to meet the expense thereof. The management of the funds of the board, so that the proceeds of the sale of unused real estate would meet the expense thereof, was an outstanding feature of the board's stewardship.

The board also established a self-insuring insurance fund, whereby many hundred thousand dollars were saved and placed in new school structures worthy of note. Six entire, and part of two buildings, were thus erected.

♦ President George J. Ryan, of the New York City board of education, has asked the indictment of five confessed members of two alleged graft rings that have taken money from persons seeking political advantage in obtaining teaching positions in the public schools. In a report presented at a conference of school officials in the Board of Education Building, affidavits signed by eight young women teaching aspirants victimized by the gangs were presented. The alleged operations of the Izzicson-Rubin combination extended over a period of eight months and were confined mostly to Brooklyn. A second ring was organized which worked independently and in competition with the first ring. In the short period of their existence, these rings fleeced hundreds of persons of amounts totaling about $30,000.

♦ **Lorain, Ohio.** The school board has adopted a budget of $944,016 for the school year 1931–32, which is a reduction of $4,300 over that of 1930. Of the total, $71,000 is devoted to the building and improvement fund, while $873,016 is to be used for operating expenses. The cost for school supplies will be $7,550. The salary item, the largest in the budget, totals $536,368 for the year, which is an increase of $5,783 over last year.

♦ Houston, Tex. The school board has decided to sell $2,300,000 in tax-anticipation warrants this year. The action has been necessary to offset a shortage in funds due to delinquent taxes.

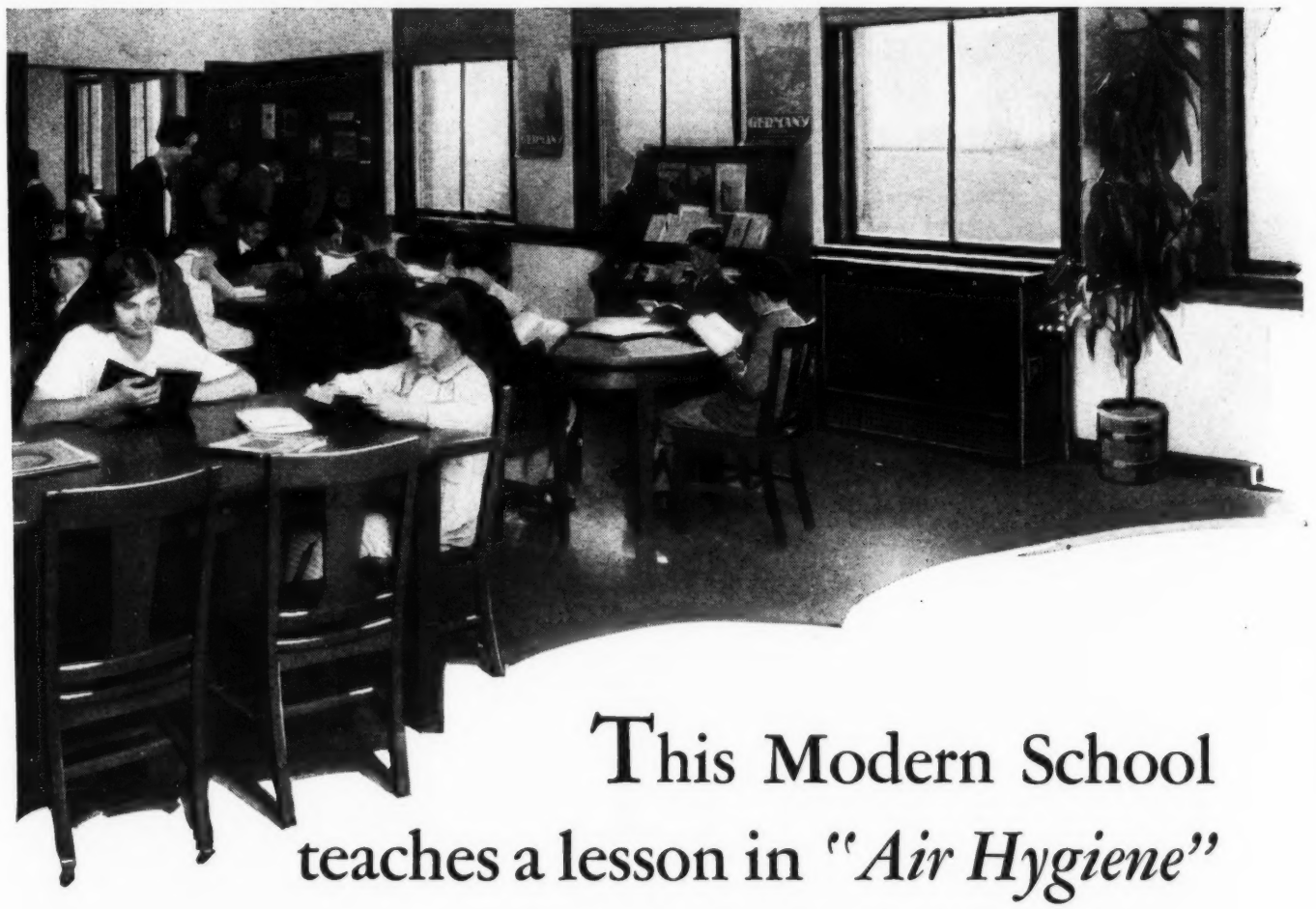
♦ Cleveland, Ohio. The large suburbs have joined with Cleveland in a new county-wide plan of using private citizens for duty as traffic guards. Beginning with February 1, six men were assigned for duty five school days each week in the outlying districts. They receive $3.50 for four hours of work and relieve the regular police officers who are thus made available for night duty.

♦ South Bend, Fort Wayne, and Gary, three of the largest cities in Indiana, have joined in a campaign against politics in education and against legislation detrimental to school interests. The school officials have pledged themselves to a program of legislation which will prevent these cities from falling into first-class division should the status quo act be repealed or declared unconstitutional, making a previous Indianapolis act effective.

A bill regulating the number of trustees of school cities, specifying their appointment by mayors, and fixing their salaries at $500 was adopted for presentation to the Indiana assembly. If passed, the law will relate to all cities from 101,000 to 250,000 population.

EDUCATION IN ACTION

A school club in a junior high school in Philadelphia with a debate under way is illustrated in the above cut, reproduced through the courtesy of Dr. E. C. Broome, Superintendent of Schools.



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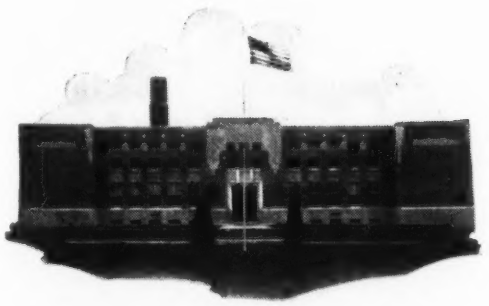

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Teachers' Salaries

♦ A movement on the part of taxpayers of Minneapolis, is designed to prompt the board of education to suspend on July 1, 1931, the automatic salary increase inaugurated in 1927. The contention is made that public expenditures cannot be allocated before the taxes are collected and deposited in the public treasury. The board of education has thus far taken no action in the matter, nor have the teachers announced their final position.

♦ Adrian, Mich. The school board has proposed a reduction of 10 per cent on teachers' salaries. The reduction would not become effective until new contracts are prepared for the next year.

♦ Royal Oak, Mich. The school board has proposed a 25-per-cent reduction in teachers' salaries as a measure of economy.

♦ St. Louis, Mo. The school board has reduced the salaries of substitute teachers in the schools from $7 to $6 per day. In addition, the substitutes, numbering several hundred, will not receive the automatic increases of $100 a year for seniority or extra college credits, which they were given previous to September 1. The board has adopted a flat salary of $1,200 a year for 200 school days, as compared with a previous schedule of $1,400 for those with four years of college work.

♦ West Lafayette, Ohio. The school board has been asked to approve a proposed 25-per-cent reduction in the salaries of teachers. The board members pointed out that the 37½-per-cent state aid for teachers' salaries would be eliminated if the reduction were made. Grade teachers, and a part of the high-school teachers would be reduced to less than the minimum.

♦ Buckley, Wash. The school board has adopted salary schedules for the grade and high-school teachers. Under the schedule grade-school teachers will begin at a minimum of $1,080, and will advance at a rate of $40 per year, until a maximum of $1,400 is reached. High-school teachers will start at $1,200, and will receive the same increases each year, until a maximum of $1,520 is reached. Teaching experience of two years for outside teachers will be figured as one year in Buckley. Not more than one inexperienced teacher may be employed in any one year.

♦ Springfield, Ohio. A committee representative of the Communist-Worker Party recently appeared before the school board, demanding that the salaries of teachers and school officials be reduced to provide funds for taking care of the children of the unemployed. The board members explained that they have no power to reduce a teacher's salary due to a state law which says that no salary may be reduced during the period of her contract. It was mentioned that cases of nonattendance of children are checked and when the absence is due to lack of food or clothing, such cases are referred to the proper authorities.

♦ Cleveland, Ohio. The school board has under consideration a proposed reduced salary schedule, as a means of tax relief by reducing the cost of education. A new salary schedule, providing for revision downward, is being studied by Supt. R. G. Jones. A number of plans of payroll reduction have been proposed, one of which is a horizontal reduction in all salaries, including those of the administrative and supervisory staff, as well as of the teachers. The schedule is to be submitted to the school board in the spring so that, if adopted, it may be put into effect before the next school year.

♦ School officials of Indiana have declared themselves opposed to the new teachers' tenure law. School boards have felt that in shaping the tenure, experienced teachers are discharged who might serve the school for years if not for the present statute.

In Indiana, teachers who complete their sixth consecutive contract at one school become permanent fixtures and cannot be dismissed. Local school officials feel that they should have the authority to dismiss instructors whenever necessary without giving their reasons in court.

♦ The elimination of the Michigan state teachers' retirement fund, which is bankrupt, has been recommended by the special legislative committee which was appointed two years ago to study the questions. The fund faces a paper deficit of $14,213,314, and if continued under the present plan, retired teachers will receive only about 22 per cent of the annuities promised them.

The committee recommended the adoption of a model law, under which teachers would pay into the retirement fund 5 per cent of their salaries, while the state would add about $2,000,000 a year. Under the plan, annuities, now ranging from $300 to $500, would increase to from $700 to $1,000, according to length of service of the teacher.

Teachers and Administration

♦ Nebraska Teachers' Association recently purchased a piece of property near the state capitol at Lincoln as the permanent home of the association. The purchase price was $22,000. The large residence on the property will be remodeled to house the various departments of the association.

♦ Periodic attendance at summer school is to be required of teachers in the Walden, N. Y., public schools, under a policy adopted by the board of education. The plan which goes into effect in a modified form this summer, will later be extended in scope. Under the plan, teachers will eventually be required to attend summer school at least once every five years.

The plan was adopted after an investigation by Supt. E. R. Van Kleeck, which sought to determine the lateness of the staff's professional training, the teachers' professional reading, educational and professional training, and similar points. For the present, teachers are only requested to attend summer school, in cases where they have not attended since 1925. With the plan in full force, the present request date will be advanced from year to year.

♦ The county board of education of LaPorte county, Ind., has adopted a policy which is opposed to employment of additional married women teachers in the school system. Married women having contracts will not be ruled out.

♦ Detroit, Mich. The Mayor's committee on teachers' salaries has reached a tentative agreement of what their recommendations shall cover. At the suggestion of Mr. A. D. Jamieson, there will be four recommendations. One will change the terminology of the question presented to the committee from "teachers' salary raises" to "adherence to the salary schedule." A second will cover the moral obligation of the board to adhere to the schedule, a third will be a recommendation as to whether the schedule is fair in the light of the present conditions, while the fourth will be a recognition as to whether or not the city faces a serious financial condition.

♦ Waltham, Mass. The school board has intimated that teachers whose salaries are determined by a sliding scale, and who are entitled to annual increases, will be assured of their raises this year. It is the opinion of the board members that the schedule constitutes a binding contract and that the teachers are entitled to their customary pay raise this year if they have not reached the maximum salary.

New Rules and Regulations

The Milwaukee board of education has amended its rules governing the adoption of textbooks. Prior to February 1, the superintendent may receive suggestions as to changes of books that have been in use for at least five years. These suggestions must be submitted to the committee on instructions by February 15. Report must be made in March. Samples of textbooks must be filed with the superintendent. The new rule then reads:

"Expositions of the merits of their textbooks shall be made by publishers or their duly accredited representatives during the month of March only and at such times and places as are designated by the superintendent of schools. All such expositions shall be made in school buildings. The superintendent shall provide an evaluation schedule which shall be returned immediately to him signed by each teacher and principal who shall have heard the expositions of the several textbooks.

"A complete summary of the opinions of teachers, principals, and superintendents shall be submitted by the superintendent to the committee on instruction not later than April 15. At this time, the superintendent shall name the two series of textbooks in each subject in which changes are to be considered which receive the highest evaluation of teachers, principals, and superintendency. If approved by the committee on instruction, this report shall be transmitted to the board at its regular May meeting.

"If, at the regular meeting of the board in May, a majority of the board votes to make textbook changes in the subject under consideration, the secretary of the board shall be instructed to purchase a sufficient number of the textbooks of each of the two series receiving the most favorable consideration of teachers and principals to permit their use as regular texts in full classes equal to 5 per cent of the total number of all pupils for whose use the textbooks are being considered. The cost of textbooks for trial use shall be deducted from the supplementary reading fund for the current year, and all such textbooks purchased for this purpose shall remain the property of the public-school system of Milwaukee.

"Between the first Monday in October and the last Friday in February of the school year next following, the superintendent shall arrange for use by the same teachers of both of the series of textbooks under consideration. The textbooks shall be used in as many different schools as is practicable and their use shall be for consecutive and succeeding periods of four weeks. At the end of each week, each teacher using the textbooks shall file with the superintendent an evaluation report in such manner and form as the superintendent may prescribe, containing his or her estimate of the merits of the text on trial as a basic text. Each such report shall be countersigned by the principal of the school."

♦ The Cincinnati board of education has adopted new rules which provide for two standing committees, one on buildings and one on finance. The president of the board is an ex officio member without vote.

♦ Minneapolis, Minn. The school board has amended its rules governing ticket sales and maternity leave for teachers. The rules, as amended, read as follows:

Ticket Sales. Soliciting money for advertising, except for school papers and magazines published for the purpose of improving the writing of pupils, is prohibited; the sale of tickets for entertainments given under the auspices of a school organization is prohibited, except at the ticket booth, or at the door of the school by pupils. No tickets for any other purpose shall be sold in the building. No paid entertainment shall be held during school hours. All activities connected with the schools, whether they be of a social, educational, or benevolent character, shall be under the direction of the superintendent, subject to the order of the board.

♦ Dr. J. R. McGaughy, professor of education at Teachers College, New York, in a recent address before the New York Association of Elementary Principals, argued against homogeneous grouping of pupils, asserting that this form of pupil-grading on the basis of intelligence tests violates the fundamental principles of modern education.

One of the strongest arguments against homogeneous grouping, according to Professor McGaughy, is its social and psychological effect upon the children, pointing out that it makes the brighter pupils feel superior, and the slower pupils feel inferior.

Professor McGaughy referred to educators who have become convinced that homogeneous grouping is impossible, but who still defend three-part grouping under the name of ability grouping. This and every other type of grouping, regardless of the name by which it is called, makes it easy and almost necessary for the teachers of these groups to neglect and disregard the individual pupil.

THE MANKATO SCHOOL ROW

Owing to the frequency in school superintendency changes someone has designated Makato, Minn., as "a superintendent's graveyard." The recent trouble was caused when the board of education by a vote of 5 to 3 dropped Supt. H. H. Eelkema. This action culminated in a protest meeting attended by 800 citizens.

Dr. J. A. Hielscher, who presided at the protest meeting, stated that "four major troubles with the system at present are politics in the school board, too frequent changes in school superintendents, lack of coöperation between board and superintendent, and the disposition on the part of teachers to carry their troubles to members of the board rather than to the executive."

The resolutions adopted commend Supt. H. H. Eelkema as a school administrator and recommend his retention in office.

SOUTHEAST TEXAS SCHOOL BOARDS HOLD MEETING

The school boards of Southeast Texas held a meeting on February 21, at the Texas State Hotel, Houston, Texas.

Mr. H. W. Stanley, of the East Texas Chamber of Commerce, talked on "Health Conditions in Southeast Texas"; Mr. J. H. Ross, of Freeport, discussed "Our Schools from the Point of View of a School-Board Member"; Mr. M. R. Wood, Sugarland, talked on "Teacher Turnover and Mass Production"; and Mr. Levy Fry, Texas City, took as his topic, "The Board Member as a Builder of the Profession."

NEWS OF OFFICIALS

♦ Mr. Jacob Chillas has been elected a member of the school board of South Bend, Ind., to succeed Mr. Frank Mayr, Jr., who has accepted the office of secretary of state.

♦ Supt. C. W. Crandell, of Monroe, Mich., has been reëlected for a sixth consecutive term.

♦ Supt. C. W. Brown, of Clinton, Iowa, has been reëlected for a three-year term.

♦ Supt. J. F. Hines, of Plankinton, S. Dak., has been reëlected for a fourth term.

♦ Supt. W. G. Clark, of Eldora, Iowa, has been reëlected for another year.

♦ Mr. Henry Van Hettinga, of Muscatine, Iowa, has been elected superintendent of schools, to succeed E. A. Sparling. Mr. Van Hettinga had been principal of the high school since 1928.

♦ Mr. S. E. Knause, superintendent of buildings and grounds at Fremont, Ohio, died at his home on February 1, at the age of 69. He was custodian of the high-school building for 23 years.

♦ On February 2, at the town hall of the village of Waco, York county, Nebraska, 250 friends of Henry Wellman gathered to celebrate his eightieth birthday. Mr. Wellman, who settled in Nebraska in 1870, had served as a member of the school board for fifty years. At the close of the social evening, Mr. Wellman was presented with a purse of money by the guests.

♦ Mr. R. H. Gericke is the new member of the school board at Owatonna, Minn., succeeding A. N. Kalb.

♦ The school board of Lansing, Mich., at its semi-monthly meeting on January 26, complimented Mr. R. W. Cooper, secretary of the board, who recently completed his twenty-fifth year of service on the board. In addition to his work as secretary, Mr. Cooper had served in various capacities on the board.

♦ For the eleventh year, Mrs. Sarah H. Moffat is beginning a term as a member of the board of education of Murray, Utah. This is her third term. Twice she has been on the board, once as president. She is the first woman to be elected to the school board.

♦ The school board of Glendale, Ohio, has reorganized for the year 1931, with the election of Mr. Charles Sawyer as president, Mrs. J. C. Richardson, Jr., as vice-president, and Mr. R. R. Payne as clerk. The unexpired term of Mr. S. W. Allen was filled by the election of Mr. William P. Matthews as board member.

♦ The school board of Worcester, Mass., has reorganized, with the election of Mr. Albert Farnsworth as president, Mr. Joseph F. Leahy as vice-president, and Mr. Joseph Beals as clerk and business manager.

♦ Mr. E. P. Nutting, formerly principal of the high school at Moline, Ill., has been elected assistant superintendent of schools. Mr. Nutting will take over the work of Supt. L. A. Mahoney, who has been confined to a hospital suffering from an injury received in a fall.

♦ Mr. F. C. Ransdell has been reëlected superintendent of schools at Dunkirk, Ohio.

MONTANA SCHOOL BOARDS APPROVE PROGRESSIVE LEGISLATION

The Montana School Boards Association held its fifth annual meeting on January 12 and 13, at Missoula, Mont. A total of 90 school-board officials were in attendance, representing 67 districts.

The Association adopted the following resolutions:

1. Approved a resolution recommending the passage of the cigaret tax now pending in the state legislature under which the monies received therefrom shall go to the public-school fund.

2. Approved a resolution urging the state legislature to appoint a special interim tax commision to study Montana tax problems with the objective of recommending other types of state-wide taxation to equalize educational opportunity.

3. Approved a resolution urging the state legislature to provide for a special commission similar to the High School Law Revision Commission, to do a like work relative to the elementary school laws of the state.

4. Approved a resolution providing that the state superintendent of public instruction shall be empowered to appoint one superintendent from each county of the state to act in an advisory capacity to the State Textbook Commission.

The Association selected Lewistown, Mont., as their next meeting place and elected the following officers for the ensuing year:

President, J. D. Wallace, Butte; 1st vice-president, Fred T. Parker, Hamilton; 2nd vice-president, J. C. Haglund, Cut Bank; 3rd vice-president, Fritz Roll, Great Falls; secretary-treasurer, E. L. Marvin, Billings. Executive Committee, J. D. Wallace, Butte; Fred T. Parker, Hamilton; C. H. Asbury, Crow Agency; C. B. Wilson, Havre; Dr. J. R. Burgess, Wolf Point; Mrs. Geo. Hirst, Lewistown; E. L. Marvin, Billings.

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Personal Age, 26 years; married; no children; interested in music; Member of Methodist Episcopal Church, of California Teachers' Association and of American Statistical Association.

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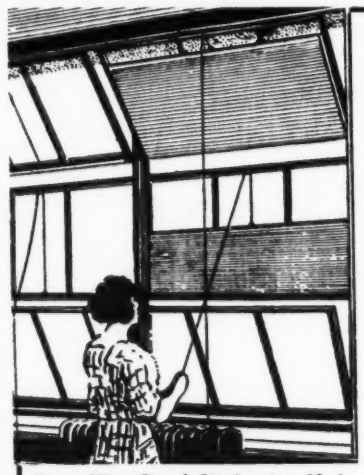

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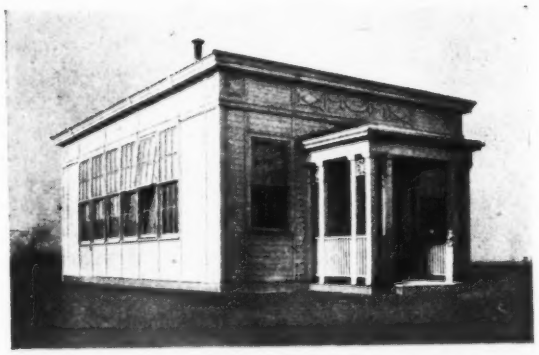

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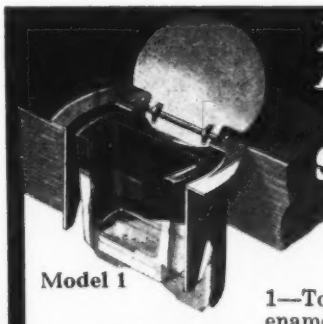

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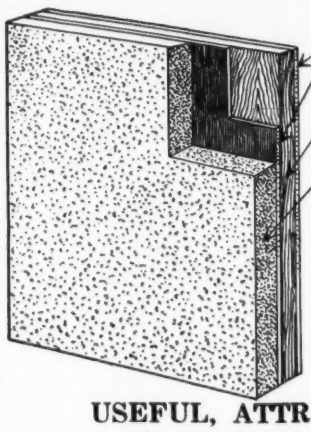

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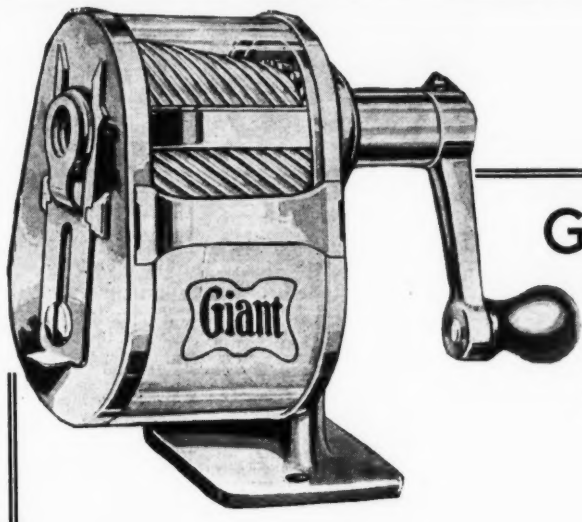

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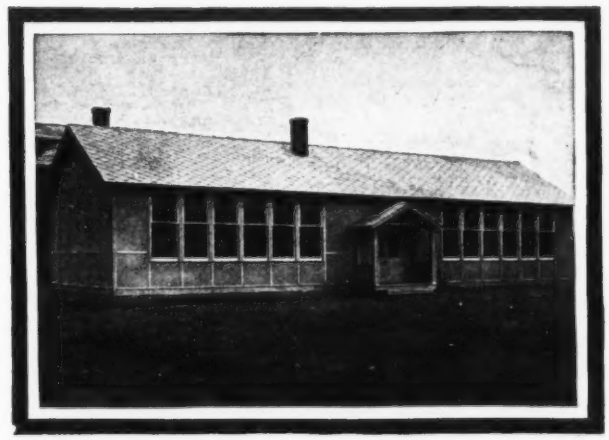

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(Continued on Page 156)

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. . . . Can an education be termed successful unless it prepares the individual to take a *definite* place in the professional or industrial life of the community in which he lives?

Education is a means to an end. To succeed, it must be considered in terms of how it can be most advantageously used toward that end. But there's the rub. How many students in your aquaintance either in high school or in college have more than a vague notion of why they are there, or what practical application they will be able to make of that education when school days are no more?

Measures to correct this prevailing evil are more than desirable; they are *essential* if education is to yield a return in proportion to its worth. There is need of educational guidance and direction. Every high-school student should be encouraged to fix in his mind a definite goal toward which his education is leading him. An exceedingly helpful booklet, designed for this purpose, has come from the press under the title: MY EDUCATIONAL GUIDEBOOK. Prepared by two of the country's outstanding leaders in vocational guidance, Messrs. Rodgers and Belman, it offers an intelligent plan to aid the student in working out his individual educational problem. Any student who conscientiously follows the plan as presented will discover his own special capacities, what education he needs to develop them, and the rewards awaiting him at the completion of that education. Here is undoubtedly a step in the right direction; it renders education a practical tool and makes better citizens of all who use it.

Directory of Equipment and Supplies

(Continued from Pafe 154)

MIMEOGRAPHS
Dick Co., A. B.
MODELING CLAY
American Crayon Company
MOTION PICTURE MACHINES
Eastman Teaching Films, Inc.
OPERA CHAIRS
Rowles Co., E. W. A.
PAINTS
American Crayon Company
Sonneborn Sons, L.
U. S. Gutta Percha Paint Co.
Vortex Mfg. Co.
PAINTS—TECHNICAL
Sonneborn Sons, Inc., L.
Truscon Steel Company
PAINT SPRAYING EQUIPMENT
DeVilbiss Mfg. Co., The
Vortex Mfg. Co.
PANIC EXIT DEVICES
Potter Manufacturing Corp.
Steffens-Amberg Company
Vonnegut Hardware Company
PAPER
American Crayon Company
Beckley-Cardy Company
PENCILS
American Crayon Company
PENCIL SHARPENERS
Automatic Pencil Sharpener Co.
PHYSICS EQUIPMENT
Welch Mfg. Co., W. M.
PIANOS
Kimball Company, W. W.
PLAYGROUND APPARATUS
Chicago Gymnasium Equipment Co.
Hill-Standard Company
Narragansett Machine Company
Potter Manufacturing Corp.
PLAYGROUND ENCLOSURES
American Wire Fence Company
Anchor Post Fence Company
Continental Steel Corporation
Cyclone Fence Co.
Page Fence Association
Stewart Iron Works Co., The
Wickwire Spencer Steel Company
PLAYGROUND EQUIPMENT
Giant Manufacturing Company
PLUMBING FIXTURES
Clow & Sons, James B.
Crane Company
Hoffmann & Billings Mfg. Co.
Rundle-Spence Mfg. Company
Sloan Valve Company
Vogel Company, Joseph A.
POINTERS
N. Y. Silicate Book Slate Co.
Weber Costello Company
POLISHING AND WAXING EQUIP.
Finnell System, Inc.
Hillyard Chemical Company
Hild Floor Machine Co.
PORTABLE BLEACHERS
Circle A Products Corp.
Pittsburgh-Des Moines Steel Co.
Universal Equipment Co.
Wayne Iron Works
PORTABLE SCHOOLHOUSES
American Builders, Inc.
Asbestos Buildings Co.
Circle A Products Corporation
Harris Brothers Company
PROJECTION LANTERNS
Beseler Co., Charles
Spencer Lens Co.
PROJECTION MACHINES
Eastman Teaching Films, Inc.
RCA Photophone, Inc.
PROJECTORS
Bausch & Lomb Optical Co.
PUBLIC ADDRESS SYSTEMS
Baritone Mfg. Co.
Graybar Electric Co., Inc.
International Business Machines Corp.
Multi-Selecto Phonograph, Inc.
Western Electric Co.
PUMPS—Vacuum, Condensation, Centrifugal, Sump
Nash Engineering Co.
PUPILS' DESKS
Rowles Co., E. W. A.
RACKS, GYM. BASKET (STEEL)
Durabilt Steel Locker Co.
RADIOS
Multi-Selecto Phonograph, Inc.
RCA Victor Corp.
RANGES
Van Range Co., The John
Westinghouse Electric & Mfg. Co.
RECORD SYSTEMS
Remington-Rand Business Service, Inc.
REFRIGERATION
General Electric Company
RE-INFORCED STEEL
Berger Mfg. Company
Truscon Steel Co.
REPRODUCTION SYSTEMS
Western Electric Company
ROLLING PARTITIONS
Wilson Corp., Jas. G.
SAFETY STAIR TREADS
American Abrasive Metals Co.
SANDERS
Hild Floor Machine Co.
SASH OPERATING DEVICES, STEEL
Detroit Steel Products Co.
Truscon Steel Company
SCIENTIFIC APPARATUS
Rowles Co., E. W. A.
Standard Electric Time Company
Welch Mfg. Co., W. M.
SCREENS—PICTURE
Eastman Teaching Films, Inc.
SCRUBBING EQUIPMENT
Continental Chemical Corp.
SEWAGE EJECTORS
Nash Engineering Co.
SEWING MACHINES
Singer Sewing Machine Co.
SHADE ADJUSTERS
Eveleth Mfg. Co.
SHEARS AND SCISSORS
Acme Shear Co.
SHOE LOCKERS (STEEL)
Durabilt Steel Locker Co.
SHOWERS
Clow & Sons, James B.
Crane Co.
Hoffmann & Billings Mfg. Co.
SIGNS
Russell & Sons Co., Albert
SLATED CLOTH
Beckley-Cardy Company
N. Y. Silicate Book Slate Co.
Rowles Co., E. W. A.
Weber Costello Company
SOUND PICTURES
Electrical Research Products, Inc.
RCA Photophone, Inc.
SOUND SYSTEMS
Baritone Mfg. Co.
Electrical Research Products, Inc.
Multi-Selecto Phonograph, Inc.
SPRAY PAINTING EQUIPMENT
DeVilbiss Mfg. Co., The
Vortex Mfg. Co.
STAFF LINERS
Weber Costello Company
STAGE CURTAINS, EQUIPMENT, AND SCENERY
Electrical Equipment Co., The
Tiffin Scenic Studios
Twin City Scenic Company
Universal Scenic Studios, Inc.
Volland Scenic Studios
Weiss & Sons, I.
STAINS
Johnson & Son, S. C.
STAIR TREADS
Alberene Stone Company
American Abrasive Metals Co.
Norton Company
Sanymetal Products Company
STATIONERY CABINETS (STEEL)
Durabilt Steel Locker Co.
STEEL JOISTS
Truscon Steel Company
STEEL LOCKERS
Berger Manufacturing Co.
Durabilt Steel Locker Co.
Lyon Metal Products Co.
Narragansett Machine Co.
STEEL STORAGE CABINETS
Berger Mfg. Co.
Durabilt Steel Locker Co.
Lyon Metal Products, Inc.
STEEL WINDOWS
Detroit Steel Products Corporation
Truscon Steel Company
STOOLS—STEEL ADJUSTABLE
Royal Metal Mfg. Company
STOKERS
Iron Fireman Mfg. Co.
TABLES
Kewaunee Mfg. Company
Kimball Company, W. W.
Mutschler Bros. Company
Remington-Rand Business Service, Inc.
Sheldon & Company, E. H.
Welch Mfg. Co., W. M.
TABLETS—BRONZE
Russell & Sons Co., Albert
TALKING MACHINES
RCA Victor Corporation
TEACHER AGENCIES
Natl. Association of Teacher Agencies
Teacher Agencies Directory
TEACHERS' CABINETS (STEEL)
Durabilt Steel Locker Co.
TECHNICAL PAINTS
Sonneborn Sons, L.
TELEPHONE SYSTEMS
Automatic Electric Company
Graybar Electric Co., Inc.
International Business Machines Corp.
North Electric Mfg. Company, The
Standard Electric Time Company
TEMPERATURE REGULATION
Johnson Service Company
TENNIS NETS
American Wire Fence Company
TOILET PAPER AND FIXTURES
A. P. W. Paper Company
TOILET PARTITIONS
Clow & Sons, James B.
Milwaukee Stamping Co.
Sanymetal Products Company
TOOL CABINETS
Sheldon & Company, E. H.
TOOL CABINETS (STEEL)
Durabilt Steel Locker Co.
TOWELS
A. P. W. Paper Company
Brown Company
TYPEWRITERS
Remington-Rand Business Service, Inc.
Underwood Typewriter Company
VACUUM CLEANING SYSTEMS
Spencer Turbine Company, The
Sturtevant Co., B. F.
VACUUM PUMPS
Nash Engineering Company
VALVES—FITTINGS
Clow & Sons, James B.
Crane Company
Sloan Valve Company
VARNISHES
Hillyard Chemical Company
Wis-Co-Lac Co., The
VENTILATING SYSTEMS
American Air Filter Co.
Buckeye Blower Company
Nelson Corp., The Herman
Peerless Unit Vent. Co., Inc.
Sturtevant Company, B. F.
VENTILATORS
Sturtevant Company, B. F.
VISUAL INSTRUCTION EQUIPMENT
Keystone View Company
VOCATIONAL EQUIPMENT
Christiansen, C.
Columbia School Supply Co.
Kewaunee Mfg. Company
Kimball Company, W. W.
Richards-Wilcox Mfg. Co.
Sheldon & Company, E. H.
Welch Mfg. Company, W. M.
WARDROBES
Austral Window Co.
Evans, W. L.
K-M Supply Company
Park, Winton & True Co.
Prose-Maco Mfg. Company
Richards-Wilcox Mfg. Company
Wilson Corp., Jas. G.
WARDROBE CABINETS—STEEL
Durabilt Steel Locker Co.
WASTE PAPER BASKETS
National Vulcanized Fibre Co.
WASTE RECEPTACLES
Solar-Sturges Mfg. Co.
WATER CLOSETS
Clow & Sons, James B.
Crane Co.
Vogel Co., Joseph A.
WATER COLORS
American Crayon Company
WATER PURIFIERS
Clow & Sons, Jas. B. (R. U. V.)
Wallace & Tiernan, Inc.
WATERPROOFING
Sonneborn Sons, L.
Truscon Steel Company
WAXING EQUIPMENT
Finnell System, Inc.
Hillyard Chemical Company
Johnson & Son, S. C.
WEATHERSTRIPS
Athey Company, The
WINDOWS—ADJUSTABLE
Austral Window Company
Detroit Steel Products Company
Kawneer Company, The
Truscon Steel Company
Universal Window Company
Williams Pivot Sash Company
WINDOW FIXTURES
Austral Window Company
Columbia Mills, Inc.
Peerless Unit Ventilation Co., Inc.
Williams Pivot Sash Company
WINDOW GUARDS
Badger Wire & Iron Works
Stewart Iron Works Co., The
WINDOWS—REVERSIBLE
Austral Window Company
Detroit Steel Products Company
Williams Pivot Sash Copmany
WINDOW SHADE CLOTHS
Columbia Mills, Inc.
du Pont de Nemours & Co., E. I.
Hartshorn Company, Stewart
WINDOW SHADE ROLLERS
Columbia Mills, Inc.
Hartshorn Company, Stewart
WINDOW SHADES
Athey Company, The
Beckley-Cardy Company
Columbia Mills, Inc.
Draper Shade Co., Luther O.
du Pont de Nemours & Co., E. I.
Forse Manufacturing Co.
Hartshorn Company, Stewart
Maxwell & Co., Inc., S. A.
Rowles Co., E. W. A.
WINDOWS—STEEL
Detroit Steel Products Company
Truscon Steel Company
WIRE GUARDS
Badger Wire & Iron Works
Cyclone Fence Company
Stewart Iron Works Co., The
WINDOW VENTILATORS
Ideal Ventilator Co.

ADVERTISERS' REFERENCE INDEX

After the Meeting

SCHOOL-BOY HOWLERS
Collected by H. Ainsworth

Necessity is the mother of convention.

An emolument is a soothing medicine.

Liberty of conscience means doing wrong and not worrying about it afterwards.

Today many people are in jail for committing suicide while under the influence of drink.

What is a mediator? A man who says, "Punch me instead."

What is the difference between a window and a widow? You can see through a window . . .

The Nile is full of crocodiles and pyramids.

The Eskimos are God's frozen people.

The climate of the island is wet but embracing.

The climate of Bombay is such that its inhabitants have to live elsewhere.

Climate lasts all the time, but weather only a few days.

A blizzard is the inside of a fowl.

The equator is a menagerie line running round the earth and through Africa.

You cannot tell the gender of "egg" until it is hatched.

It was moonlight and the air was soft and putrid.

A glacier is a man who runs down mountains.

Peat is made out of moses.

The houses in old London could shake hands.

Rhubarb is a kind of celery gone bloodshot.

Mushrooms always grow in damp places and so they look like umbrellas.

A school master leads a sedimentary life.

THEIR OWN IN CHARGE

The boys of one of Dr. Stryker's classes at Hamilton College got a goose, tied it securely in his chair, and pushed the chair under the desk, just before his expected arrival. He entered, pulled out his chair, and saw the goose occupying it.

"I beg you pardon, gentlemen," said he "for interrupting your class meeting. I see you have one of your own number in the chair."

When He Especially Believed

A certain young college professor has domestic trials of a familiar kind. He gave evidence of this when a student engaged him in a theological discussion.

"Do you," asked the student, "believe in infant damnation?"

"I do," said the professor, "especially after midnight."

Mother's Pet Name for Father

A teacher in a school was drawing pictures on the board and asked each individual what they represented. Drawing a picture she called on the little girl in the front seat.

Teacher: "Mary, what is this?"

Mary: "A kitten."

Teacher: "Willie, what is this?"

Willie: "A dog."

Teacher: "Tommy?"

Tommy: "An elephant."

Then she drew a picture of a deer and calling on little Johnnie, who had been very quiet all the period, she said:

"Johnnie, can you tell me what this is?"

Johnny: "No."

Teacher: "Think hard—What does your mother call your father?"

Johnnie: "But, a jackass doesn't have horns."

—Exchange.

The Old Ones Are Best

Some time ago, according to a story recently told by a man well known in educational affairs, the school authorities of a certain town decided that all the pupils' eyes would have to be examined by an oculist. This was done, and the teacher wrote to a father of one of the boys as follows:

"Dear Sir: I beg to inform you that Willie shows signs of astigmatism, which should be attended to at once."

On the following morning Willie went back to school and handed the teacher this letter from the fond parent:

"Dear Teacher: I don't quite understand what Willie has been up to this time, but I walloped him tonight, and you can do it again tomorrow morning."

Buyers' News

PERSONAL NEWS

Passing of F. E. Cardy. F. E. Cardy, president of the Beckley-Cardy Company, educational publishers, of Chicago, Ill., who died on January 14, at his home in that city, was born in Chicago on the near north side, close to the vicinity of Lake Shore Drive and the Gold Coast section in 1876.

Mr. Cardy began life as an office boy with the Clark Stove Company, Chicago. He entered the school field in the pioneer days of the business, with the Atlas School Supply Company. In 1905, with the discontinuance of the old firm and the establishment of the Central School Supply Company, Mr. Cardy became secretary. He continued in the office until 1910, when he sold out his interest and left the firm. In 1911, at the invitation of M. H. E. Beckley, of the Beckley Mfg. Company, a new corporation was formed under the name of the Beckley-Cardy Mfg. Company, with Mr. Cardy as secretary.

In 1912, Mr. J. C. Sindelar of the A. Flanagan Company, became associated with the firm, and the name was changed to Beckley-Cardy Company. Mr. Cardy was made vice-president, Mr. Beckley president, and Mr. Sindelar secretary. In 1919, Mr. Beckley sold out his interest, when Mr. Cardy became president, and Mr. Sindelar secretary-treasurer. The business was moved the next year to 17 East Twenty-third St., where it occupied larger quarters. It was at this time that the manufacture of blackboards was begun, an article in which Mr. Cardy was interested.

Mr. Cardy was known throughout the school field for his earnest, sincere work, and for his maintenance of high principles.

Mr. Gehres Promoted by Winston. Mr. John C. Gehres, who had been associated with the John C. Winston Company for twelve years as head of the Ohio division, has recently been appointed as manager of the firm's high-school and college department, to succeed the late George A. Helms.

Mr. Gehres is a graduate of Ohio State University and has completed postgraduate work in education at Columbia University. Mr. Gehres will devote his entire time to the promotion of the Winston Simplified Dictionary, and to commercial, English, mathematics, and modern language texts in high schools and colleges. He will have his headquarters in Philadelphia.

TRADE PUBLICATIONS

New Type E Thermovent Catalog. The Buckeye Blower Company, Columbus, Ohio, manufacturers of unit heaters, fans, and heating and ventilating systems, has just issued its new 40-page booklet, illustrating and describing the Thermovent Unit for use in auditoriums, gymnasiums, locker rooms, and libraries.

The Type E Buckeye Thermovent Unit consists of two Buckeye multiblade fans, contained within fan scrolls, and mounted on shaft extensions of a spring-supported electric motor of proper speed and horse power; combination heating and by-pass dampers and two flat-tube, all-copper, high-condensing radiators. The entire unit is contained in a substantial furniture metal cabinet, finished in Crystaline green, baked on.

The unit is intended for ventilating or for heating and ventilating schools, auditoriums, gymnasiums, and other places where dependable heating and ventilation are required. The unit has been carefully designed to insure quietness in operation, as well as maximum efficiency at the rated motor speed. The temperature of the delivered air may be varied to maintain the required room temperature by either manual or automatic operation of the heating and by-pass dampers. The design provides a unique system of air distribution which eliminates the danger of cold drafts.

The booklet contains working drawings, specifications, and other helpful information for the use of architects.

Complete information may be obtained by any school official, or architect, upon request.

New Bradley Washfountain Catalog. The Bradley Washfountain Co., of Milwaukee, Wis., has announced a new catalog, *Fixtures for Group Washing*, which presents the complete 1931 line of five-in-one group washfountains, drinking fountains, and playground showers. The booklet contains a wealth of valuable information and data regarding the opportunities for space-saving and cost-reduction economies which these washrooms afford.

The experience is that the Bradley washfountains are capable of savings of from 70 to 80 per cent in space, installation, and maintenance. The new Bradley five-in-one shower accomplishes similar savings in the shower room and indicates a new departure in shower-room design and operation. The booklet shows a number of very attractive units for other miscellaneous installations which will be of interest to school officials and architects.

A copy of the catalog will be sent to any school official, or architect, upon request.

New All-Steel Equipment Catalog. The All-Steel-Equip Company, of Aurora, Ill., manufacturers of steel lockers and other special steel equipment, has just issued a new Catalog, No. C-28, describing and illustrating its complete line of steel lockers, cabinets, boxes, filing devices, and special equipment.

The catalog lists box lockers, locker boxes, storage cabinets, wardrobe cabinets, tabulating-machine card cabinets, steel shelving units, tool racks and cabinets, filing cabinets and card cases, stacking boxes, shop boxes, tool boxes, tool stands, and tool cabinets.

School officials and architects may obtain complete information by writing to the All-Steel-Equip Company at Aurora, Ill.

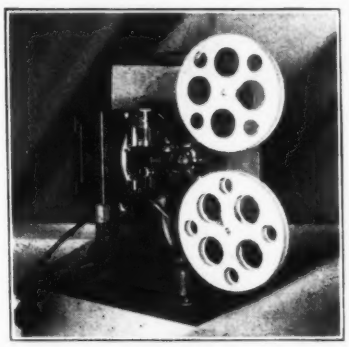
TRADE PRODUCTS

Underwood Bookkeeping Machine. The Underwood Typewriter Co., Underwood Building, New York City, has issued an interesting circular, illustrating and describing the use of the Underwood bookkeeping machine, which offers real economies in time and personnel. With this machine, the operator does more work, and more accurate work than a pen bookkeeper, and the work is in the most legible and usable form.

The machine is simple to operate, elastic in use, offers speed with light touch sufficient to expedite all accounting work, and is electrically operated to prevent fatigue and consequent error and inefficiency.

Announce New 3G Victor Cine-Projector. The Victor Animatograph Corporation, Davenport, Iowa, manufacturers of motion-picture cameras and projectors, has announced the marketing of its Model 3G Victor Cine-Projector, for use with the powerful 250-watt 20-volt lamp.

The Model 3G Cine-Projector has a special transformer built into the base, permitting the 250-watt, 20-volt lamp to be used with efficiency and with maximum lamp life. A feature of the model is its highly perfected optical system, which utilizes a great deal of

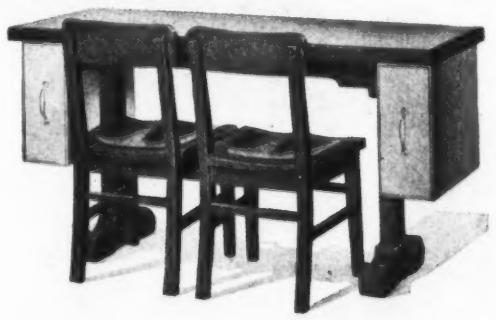


THE MODEL 3G VICTOR CINE-PROJECTOR

the light emitted by the source. Mechanically, it is identical to the widely known Model 3, previously developed. A receptacle base has been substituted for the pedestal base in which the transformer is housed, which adds beauty and character to the projector, and makes it attractive as well as highly efficient.

Complete information and prices may be obtained by any school official, who will write the Victor Animatograph Corporation at Davenport, Iowa.

New Posture Chair and Classroom Efficiency Table. The Standard School Fixtures Company, of Grand Rapids, Mich., has just announced the marketing of a students' classroom efficiency table. The table is made in eight different types to suit particular needs, is provided with linoleum or wood tops, and may be had in solid or five-ply stock. The table has a number of special advantages, such as greater knee space, acces-



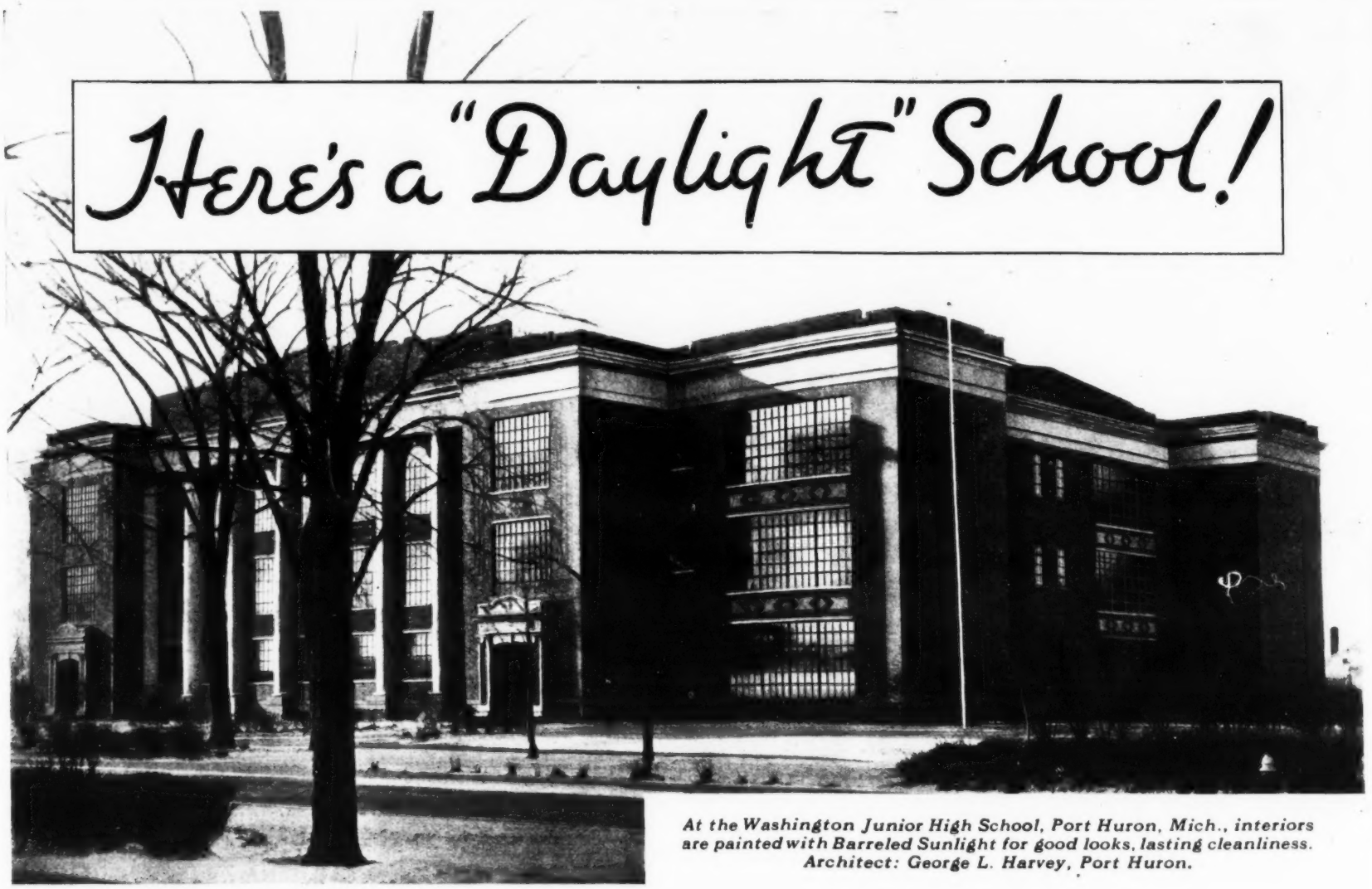
THE NEW EFFICIENCY SCHOOL DESK AND KELLOGG POSTURE CHAIRS

sibility of books without moving from chairs, ideal writing surface, dustproof book trays, and ample clearance at legs.

The firm also manufactures the Kellogg posture chair, which is a perfect posture chair for maintaining comfort and rest of students while engaged in study. The chair comes in three heights for primary, junior, and senior pupils and has received enthusiastic approval because of its physiological and durable features.

Complete information may be obtained by any school official upon request.

Here's a "Daylight" School!



At the Washington Junior High School, Port Huron, Mich., interiors are painted with Barreled Sunlight for good looks, lasting cleanliness. Architect: George L. Harvey, Port Huron.

Barreled Sunlight *helps to keep it well lighted, and insures lasting cleanliness as well . . .*

WIDE window frames, narrow steel sash, plenty of panes . . . Classrooms at the Washington Junior High School are flooded with daylight.

Unpleasant glare has been avoided, a soft agreeable working light has been assured, by painting interiors with lustrous satin-smooth Barreled Sunlight.

Not only distinctively good looking, but decidedly practical. Barreled Sunlight's satin-smooth, lustrous surface stubbornly resists yellowing. Stays clean for a surprisingly long time. An occasional washing removes all superficial dust and smudges. When a thorough cleaning becomes desirable, Barreled Sunlight washes like tile without wearing away. Initial cost is reasonable; maintenance costs are decidedly low.

Barreled Sunlight blends readily with any good oil color, producing beautifully clear, lasting tints to match any desired scheme of decoration.

For more complete information . . . for a sample panel . . . please mail the coupon.

U. S. Gutta Percha Paint Co., 44—C Dudley St., Providence, R. I. Branches or distributors in all principal cities. (For Pacific Coast, W. P. Fuller & Co.)

Barreled Sunlight
Reg. U. S. Pat. Off.

Easy to Tint

Barreled Sunlight is readily tinted any desired shade with ordinary colors in oil. Quantities of 5 gallons or over are tinted to order at the factory without extra charge.

U. S. Gutta Percha Paint Co.
44—C Dudley Street, Providence, R. I.

Please send me your descriptive booklet, and a panel painted with Barreled Sunlight. I am interested in the finish checked here:

Gloss ☐ Semi-Gloss ☐ Flat ☐

Name_____

Street_____

City_____ State_____

just as inadequate

SOMEDAY, it will be recognized that the mop and pail are just as inadequate for cleaning floors in schools as was the washtub in the home kitchen for the Saturday night bath.

The *Finnell Electric Polisher-Scrubber* does for floor cleanliness what the modern bathroom has done for personal cleanliness.

In scrubbing, the Finnell uses clean water for every square inch. The machine here illustrated is a marvelous combination machine that scrubs and picks up the water in one operation. High speed scrubbing brushes rout out every particle of dirt, and before the dirt can settle, a powerful vacuum draws up the dirty water, leaving the floor clean and dry. It *scrubs* at less than the cost of mopping.

On polished floors the Finnell is just as efficient. A new process, *Finnell-Kote* literally cuts in two the time required for applying the wax and polishing the floor. The *Finnell-Kote* dispenser (see illustration) can be fitted to any *Finnell* machine, and will gladly be loaned to any *Finnell* user.

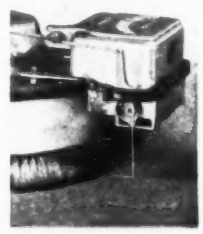
To the efficient school board, considerate of the tax payer's interest, the savings made possible by Finnell equipment are important. Regardless of savings, however, nothing less than the *Finnell*-maintained standard of cleanliness should be admitted in modern schools.

Investigate now. A Finnell representative will be glad to make a survey of floor area and conditions in your school and recommend the right system of the twenty systems possible with Finnell equipment. Address *FINNELL SYSTEM*, Inc., 803 East Street, Elkhart, Indiana.

For Home Use, too

A light weight Finnell for homes and small areas. Waxes, polishes, finishes and scrubs—wet or dry. Write for low price and easy terms.

FINNELL -KOTE



Waxes and Polishes in One Operation

Finnell-Kote is a specially prepared wax of high solid-content. The *Finnell-Kote* dispenser melts it and flows it to the floor in a thin, thread-like stream to be distributed by the brushes, and—an instant later—brought to a uniformly beautiful, durable finish.